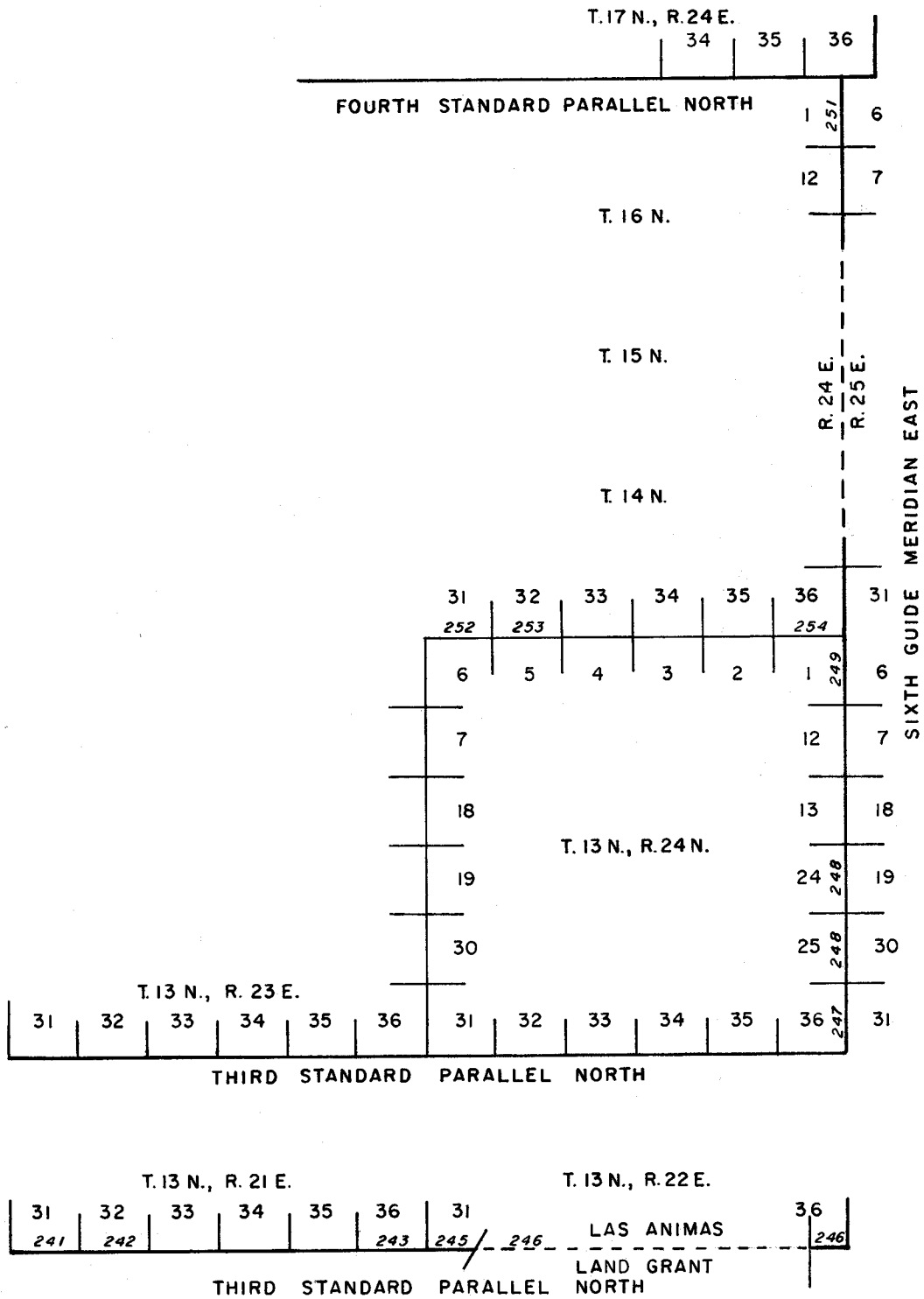


Sample Field Notes

SPECIMEN
FIELD NOTES
OF THE SURVEY OF THE
THIRD STANDARD PARALLEL NORTH
ALONG THE SOUTH BOUNDARY OF TOWNSHIP 13 NORTH,
THROUGH RANGES 21, 22, 23, AND 24 EAST;
THE SIXTH GUIDE MERIDIAN EAST
THROUGH TOWNSHIPS 13, 14, 15, AND 16 NORTH,
BETWEEN RANGES 24 AND 25 EAST;
AND THE
WEST AND NORTH BOUNDARIES OF
TOWNSHIP 13 NORTH, RANGE 24 EAST.

(Note: Remainder of title omitted.)

INDEX TO SPECIMEN FIELD NOTES



3d Stan. Par. N., S. Bdy. of T. 13 N., R. 21 E., ____ Mer., (State)

CHAINS

The Third Standard Parallel North, through Range 20 East, was surveyed by Joseph P. Smith in 1884. The Fourth Standard Parallel North, through Range 24 East, was surveyed by John C. Collins in 1887 and was resurveyed by Andrew Porter in 1906.

The following field notes describe the survey of the Third Standard Parallel North along the south boundary of Township 13 North, through Ranges 21, 22, 23, and 24 East; the Sixth Guide Meridian East between Ranges 24 and 25 East, through Townships 13, 14, 15, and 16 North; and the west and north boundaries of Township 13 North, Range 24 East.

The survey was executed in accordance with the Manual of Surveying Instructions, (Year), and Special Instructions for Group No. ____, (State), dated ____.

The directions of lines refer to the true meridian as determined by observations of Polaris, projected by fore- and backsights. Standard lines were chained twice, and the mean of the measurements is given in the field notes.

The geographic position of the standard corner of Tps. 13 N., Rs. 24 and 25 E., as scaled from the quadrangle map, "SHEEPSHEAD ROCK," published by the Geological Survey in 1963, is as follows:

Latitude 36° 59.6' N. Longitude 104° 38.3' W.

The mean magnetic declination is 18° 10' E.

Third Standard Parallel North, on the South Boundary of
T. 13 N., R. 21 E., ____ Meridian, (State)

Beginning at the stan. cor. of Tps. 13 N., Rs. 20 and 21 E., monumented with a granite stone, 12 x 10 x 8 ins. above ground, firmly set, mkd. SC 13N on N, 20E on W, and 21E on E face, from which the original bearing trees

A yellow pine, 10 ins. diam., bears N. 10° E.,
30 lks. dist., with healed blaze.

A yellow pine, 18 ins. diam., bears N. 25° W.,
50 lks. dist., with healed blaze.

East, with the establishment of the 3d Stan. Par. N., on the S. bdy. of sec. 31, T. 13 N., R. 21 E., on a transit line describing the secant, which starts from a point 4 lks. South of the Tp. cor., and bears N. 89° 58' E.

Over gently rolling land, through scattering timber.

28.10 Enter heavy timber, edge bears NW and SE.

40.00 Point for the stan. $\frac{1}{4}$ sec. cor. of sec. 31, North 2 lks. from the secant.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.

SC
T 13 N R 21 E
 $\frac{1}{4}$ S 31
1972

from which

MANUAL OF SURVEYING INSTRUCTIONS

3d Stan. Par. N., S. Bdy. of T. 13 N., R. 21 E., Mer., (State)

CHAINS	
	<p>A yellow pine, 10 ins. diam., bears N. $64\frac{1}{2}^{\circ}$ E., 48 lks. dist., mkd. $\frac{1}{4}$ S31 SC BT.</p> <p>A blue spruce, 8 ins. diam., bears N. $11\frac{1}{4}^{\circ}$ W., 127 lks. dist., mkd. $\frac{1}{4}$ S31 SC BT.</p>
46.50	Enter clearing, edge bears N. 35° E. and S. 35° W.
47.00	Road, dirt, 25 lks. wide, follows edge of clearing.
58.00	SE cor. of cabin, 20 x 10 ft., bears North, 16 chs. dist., long side bears E and W.
63.50	Enter heavy timber, edge bears N and S.
80.00	Point for the stan. cor. of secs. 31 and 32, on the secant.
	Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.
	<div style="text-align: center;"> SC T 13 N R 21 E S 31 S 32 <hr style="width: 50%; margin: 0 auto;"/> 1972 </div>
	from which
	<p>A yellow pine, 9 ins. diam., bears N. $31\frac{3}{4}^{\circ}$ E., 22 lks. dist., mkd. T13N R21E S32 SC BT.</p> <p>A yellow pine, 8 ins. diam., bears N. 67° W., 114 lks. dist., mkd. T13N R21E S31 SC BT.</p>
	Land, gently rolling.
	Soil, loam.
	Timber, yellow pine and blue spruce, with some juniper; no undergrowth.
	East, on the S. bdy. of sec. 32, on a transit line describing the secant, which bears N. $89^{\circ}58.7'$ E.
	Over rolling land, through heavy timber.
12.00	Begin descent of 60 ft. over NE. slope.
18.40	Turkey Creek, 20 lks. wide, course S. 50° E.; asc. 175 ft. over broken SW slope.
40.00	Point for the stan. $\frac{1}{4}$ sec. cor. of sec. 32, South 1 lk. from the secant, falls on a sandstone boulder, 7 x 5 x 2 ft. above ground.
	Set a brass tablet, $3\frac{1}{4}$ ins. diam., $3\frac{1}{2}$ -in. stem, in drill hole in boulder, with top mkd.
	<div style="text-align: center;"> SC T 13 N R 21 E $\frac{1}{4}$ S 32 <hr style="width: 50%; margin: 0 auto;"/> 1972 </div>
	from which
	<p>A juniper, 8 ins. diam., bears N. $33\frac{3}{4}^{\circ}$ E., 22 lks. dist., mkd. $\frac{1}{4}$ S32 SC BT.</p> <p>A juniper, 11 ins. diam., bears N. $84\frac{1}{2}^{\circ}$ W., 192 lks. dist., mkd. $\frac{1}{4}$ S32 SC BT.</p>

3d Stan. Par. N., S. Bdy. of T. 13 N., R. 21 E., Mer., (State)

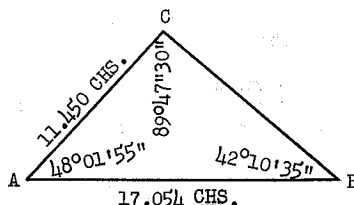
CHAINS 46.20	Top of sandstone rimrock, 12 ft. high, bears N. 45° W. and S. 60° E.; thence over nearly level land.
55.72	A bench mark of the U.S. Geological Survey, published elevation 7,946.987 ft. above mean sea level, bears South, 5.62 chs. dist.; a brass tablet seated in a sandstone boulder, conforming to the Geological Survey record.
80.00	Point for the stan. cor. of secs. 32 and 33, South 2 lks. from the secant. Set an iron post, 28 ins. long, 2½ ins. diam., 18 ins. in the ground to bedrock, encircled by a mound of stone, 3 ft. base to top of brass cap, mkd. <div style="text-align: center;"> SC T 13 N R 21 E S 32 S 33 1972 </div> from which A yellow pine, 9 ins. diam., bears N. 43 3/4° E., 27 lks. dist., mkd. T13N R21E S33 SC BT. A large sandstone outcropping, the highest point of which bears N. 57° 35' W., 87 lks. dist., mkd. X B0. Land, rolling west of creek; level table land above top of slope east of creek. Soil, rich sandy loam and rocky loam. Timber, mostly juniper, with some yellow pine and blue spruce; undergrowth, sagebrush.
	NOTE. — The field notes of the survey of the S. bdy. of secs. 33, 34, and 35 continue on the same form, and are omitted. The field notes of the survey of the S. bdy. of sec. 36 have been varied in order to show certain other forms of record.
	East, along the S. bdy. of sec. 36, on a transit line describing the secant, which bears S. 89° 58.7' E. Over level land, through dense undergrowth.
40.00	Point for the stan. ¼ sec. cor. of sec. 36, North 2 lks. from the secant. Set a sandstone, 24 x 10 x 6 ins., 16 ins. in the ground, mkd. SC¾ on N face. Raise a mound of stone, 4 ft. base, 2 ft. high, N of cor.
45.00	Begin gradual descent.
48.92	Bank of Crystal Lake, bears N. 42° E. and S. 37° W.; point for the meander cor. of sec. 36, North 2.4 lks. from the secant. Set a sandstone, 27 x 8 x 8 ins., 18 ins. in the ground, mkd. <div style="text-align: center;"> 6 grooves on N, MC on E, and 6 grooves on W face. </div>

3d Stan. Par. N., S. Bdy. of T. 13 N., R. 21 E., ___ Mer., (State)

CHAINS

Raise a mound of stone, 3 ft. base, $2\frac{1}{2}$ ft. high, W of cor.

To determine the dist. across the lake by triangulation: using the above station on the secant as point A, set a flag on the secant on the opposite side of the lake at point B; point C is taken northeasterly on the west side; the dist. from A to C is 11.450 chs.



All angles by 3 repetitions, with a closing error of $0^{\circ}00'20''$ balanced to 180° , as follows:

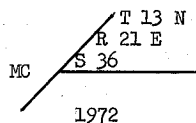
At point A = $48^{\circ}01'55''$
 At point B = $42^{\circ}10'35''$
 At point C = $89^{\circ}47'30''$

Dist. across lake = 17.054 chs.

65.974 Point B.

66.00 Bank of lake, bears N. 50° E. and S. 45° W.; point for the meander cor. of sec. 36, North 3.3 lks. from the secant.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.



from which

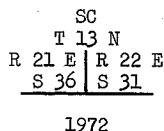
A yellow pine, 8 ins. diam., bears N. $62\frac{1}{2}^{\circ}$ E., 29 lks. dist., mkd. T13N R21E S36 MC BT.

A blue spruce, 14 ins. diam., bears N. $78\frac{3}{4}^{\circ}$ E., 313 lks. dist., mkd. T13N R21E S36 MC BT.

Enter heavy timber, edge bears N. 50° E. and S. 45° W.; asc. 215 ft. over rocky NW slope.

80.00 Point for the stan. cor. of Tps. 13 N., Rs. 21 and 22 E., North 4 lks. from the secant.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.



from which

3d Stan. Par. N., S. Bdy. of T. 13 N., R. 21 E., ____ Mer., (State)

CHAINS

A blue spruce, 12 ins. diam., bears N. $37\frac{1}{4}^{\circ}$ E.,
114 lks. dist., mkd. T13N R22E S31 SC BT.

A blue spruce, 9 ins. diam., bears N. $64\frac{3}{4}^{\circ}$ W.,
127 lks. dist., mkd. T13N R21E S36 SC BT.

Land, nearly level, west of lake; broken, east of lake.
Soil, sandy loam, somewhat rocky east of lake.
Timber, blue spruce with some yellow pine and aspen;
undergrowth, oak brush.

Third Standard Parallel North, on the South Boundary of
T. 13 N., R. 22 E., ____ Meridian, (State)

East, with the establishment of the 3d Stan. Par. N., on
the S. bdy. of sec. 31, T. 13 N., R. 22 E., on a transit
line describing the secant, which starts from a point 4
lks. South of the stan. Tp. cor. and bears N. $89^{\circ}58'$ E.

Asc. 65 ft. over rocky NW slope, through heavy timber and
scattering clumps of undergrowth.

3.50 Ridge, bears N. 60° E. and S. 60° W.; desc. 240 ft. over
SE slope.

22.30 Base of ridge, bears N. 65° E. and S. 65° W.; descent
becomes gradual.

38.40 Point for the witness stan. $\frac{1}{4}$ sec. cor. of sec. 31, North
2.1 lks. from the secant.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins.
in the ground, with brass cap mkd.

WC
SC
T 13 N R 22 E
 $\frac{1}{4}$ S 31
→
1972

from which

A yellow pine, 9 ins. diam., bears North,
16 lks. dist., mkd. X BT.

A yellow pine, 10 ins. diam., bears N. $57\frac{1}{2}^{\circ}$ W.,
92 lks. dist., mkd. X BT.

40.00 True point for the stan. $\frac{1}{4}$ sec. cor. of sec. 31, falls
at center of stream, 60 lks. wide, course N. 70° E.,
where it is impracticable to establish a permanent monu-
ment; asc. gradually over bottom land.

54.96 Intersect W. bdy. of the Las Animas Land Grant, North
1.2 lks. from the secant; point for the closing cor. of
sec. 31, T. 13 N., R. 22 E.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins.
in the ground, with brass cap mkd.

T 13 N
R 22 E
S 31
CC ——— LA
PL ——— LG
1972

MANUAL OF SURVEYING INSTRUCTIONS

3d Stan. Par. N., S. Bdy. of T. 13 N., R. 22 E., Mer., (State)

CHAINS	<p>from which</p> <p>A yellow pine, 11 ins. diam., bears N. 22 3/4° W., 57 lks. dist., mkd. T13N R22E S31 CC BT.</p> <p>A yellow pine, 7 ins. diam., bears N. 71 1/4° W., 135 lks. dist., mkd. T13N R22E S31 CC BT.</p> <p>From this point the 14th Mi. Cor. of the grant bdy. bears N. 33°38' E., 27.84 chs. dist., monumented with a sandstone, 16 x 12 x 6 ins. above the top of a mound of stone, 5 ft. base, 3 ft. high, mkd. 14M on NW and 1A LG on SE face.</p> <p>From the same point the 15th Mi. Cor. of the grant bdy. bears S. 33°38' W., 51.96 chs. dist., occupied by the original cor. tree, a yellow pine, 34 ins. diam., with healed blazes on NW and SE sides, from which the original bearing trees</p> <p>A yellow pine, 20 ins. diam., bears N. 10° E., 15 lks. dist., with healed blaze.</p> <p>A yellow pine, 15 ins. diam., bears S. 50° E., 10 lks. dist., with healed blaze.</p> <p>Land, gently rolling and broken. Soil, sandy loam. Timber, yellow pine; undergrowth, sagebrush.</p>
392.78	<p>Continue the secant on a blank line across the grant.</p> <p>Intersect E. bdy. of the Las Animas Land Grant, North 2.4 lks. from the secant; point for the closing cor. of sec. 36, T. 13 N., R. 22 E.</p> <p>Set a sandstone, 32 x 10 x 8 ins., 22 ins. in the ground, mkd.</p> <p>13 N on N, CC 22E and 1 groove on E, and 1A LG on W face.</p> <p>Raise a mound of stone, 2 ft. base, 1 1/2 ft. high, E of cor.</p> <p>From this point the 7th Mi. Cor. of the grant bdy. bears S. 0°42' E., 19.12 chs. dist., monumented with a sandstone boulder, 8 x 5 x 3 ft. above ground, mkd. + 7M, from which the original bearing trees</p> <p>A yellow pine, 12 ins. diam., bears N. 75° E., 15 lks. dist., with healed blaze.</p> <p>A yellow pine, 11 ins. diam., bears S. 30° W., 20 lks. dist., with healed blaze.</p> <p>From the same point the 8th Mi. Cor. of the grant bdy. bears N. 0°42' W., 60.62 chs. dist., monumented with a sandstone, 12 x 8 x 6 ins. above ground, firmly set, mkd. 1A LG on W and 8M on E face, with a mound of stone, 3 ft. base, 2 ft. high, W of cor.</p> <p>Thence East, on the S. bdy. of sec. 36, on a transit line describing the secant, which bears S. 89°58.3' E. and counting measurement (47.74 chs.) from the theoretical point for the stan. cor. of secs. 35 and 36.</p> <p>Over nearly level land.</p>

3d Stan. Par. N., S. Bdy. of T. 13 N., R. 22 E., ___ Mer., (State)

<div>CHAINS</div> <div>80.00</div>	<p>Point for the stan. cor. of Tps. 13 N., Rs. 22 and 23 E., North $\frac{1}{4}$ lks. from the secant.</p> <p>Set a sandstone, 36 x 10 x 8 ins., 24 ins. in the ground, mkd.</p> <p>SC 13N on N, 23E on E, and 22E on W face.</p> <p>Raise a mound of stone, 5 ft. base, 3 ft. high, N of cor.</p> <p>Land, nearly level. Soil, sandy loam with many small stones. No timber or undergrowth.</p> <p>NOTE.— The field notes of the survey of the 3d Stan. Par. N., on the S. bdy. of Tps. 13 N., Rs. 23 and 24 E., continue on the same form and are omitted.</p> <p>MEMORANDUM</p> <p>The form of the record of the survey of a standard parallel by the tangent method is similar to that of the specimen field notes describing the secant method. If the solar transit method is used, the line will conform to the parallel without the making of offsets.</p> <p>A summary description of the region crossed by a standard parallel is supplied at the close of the field notes, or the information may be carried in the general description of the subdivisional survey.</p> <p>Sixth Guide Meridian East, Through T. 13 N., Between Rs. 24 and 25 E., ___ Meridian, (State)</p> <p>From the stan. cor. of Tps. 13 N., Rs. 24 and 25 E.</p> <p>North, with the establishment of the 6th Guide Mer. E., through T. 13 N., bet. Rs. 24 and 25 E.</p> <p>Over nearly level land.</p> <div>40.00</div> <p>Point for the $\frac{1}{4}$ sec. cor. of secs. 31 and 36.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 13 N</p> <p>$\frac{1}{4}$</p> <div style="display: flex; justify-content: space-around;"> <p>R 24 E</p> <p>R 25 E</p> </div> <div style="display: flex; justify-content: space-around;"> <p>S 36</p> <p>S 31</p> </div> <p>1972</p> </div> <p>Dig pits, 18 x 18 x 12 ins., N and S of iron post, 3 ft. dist.</p> <div>43.50</div> <p>Begin gradual ascent.</p> <div>67.00</div> <p>Top of ascent; enter heavy timber, edge bears NE and SW; desc. over gradual NW slope.</p> <div>80.00</div> <p>Point for the cor. of secs. 25, 30, 31, and 36.</p>
------------------------------------	---

MANUAL OF SURVEYING INSTRUCTIONS

6th G.M. East, T. 13 N., bet. Rs. 24 and 25 E., ___ Mer., (State)

CHAINS	<p>Set a sandstone, 24 x 10 x 6 ins., 16 ins. in the ground, mkd. with 5 notches on N and 1 notch on S edge.</p> <p>from which</p> <p>A juniper, 10 ins. diam., bears N. $64\frac{3}{4}^{\circ}$ E., 70 lks. dist., mkd. T13N R25E S30 BT.</p> <p>A juniper, 12 ins. diam., bears S. $69\frac{3}{4}^{\circ}$ E., 44 lks. dist., mkd. T13N R25E S31 BT.</p> <p>A juniper, 10 ins. diam., bears S. $79\frac{1}{2}^{\circ}$ W., 59 lks. dist., mkd. T13N R24E S36 BT.</p> <p>A juniper, 20 ins. diam., bears N. $74\frac{3}{4}^{\circ}$ W., 220 lks. dist., mkd. T13N R24E S25 BT.</p> <p>Land, level and gently rolling. Soil, sandy loam, and rocky. Timber, juniper and pinon; undergrowth, sagebrush.</p>						
	<p>North, bet. secs. 25 and 30.</p> <p>Desc. gradually through heavy timber.</p>						
21.50	<p>Road, ungraded, 20 lks. wide, bears NW and SE, from Fort Meyer to Valley City.</p>						
23.20	<p>Arroyo, drains SW; asc. 100 ft. over SE slope.</p>						
40.00	<p>Point for the $\frac{1}{4}$ sec. cor. of secs. 25 and 30.</p>						
	<p>Set a sandstone, 21 x 8 x 6 ins., 14 ins. in the ground, mkd. $\frac{1}{4}$ on W face.</p> <p>from which</p>						
	<p>A juniper, 8 ins. diam., bears N. $60\frac{1}{4}^{\circ}$ E., 28 lks. dist., mkd. $\frac{1}{4}$ S30 BT.</p>						
	<p>A juniper, 11 ins. diam., bears West, 89 lks. dist., mkd. $\frac{1}{4}$ S25 BT.</p>						
64.20	<p>Top of ascent; leave timber, edge bears N. 60° W. and S. 60° E.; desc. gradually.</p>						
76.00	<p>Arroyo, drains S. 65° W.; asc. 50 ft. to sec. cor.</p>						
80.00	<p>Point for the cor. of secs. 19, 24, 25, and 30.</p>						
	<p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>						
	<div style="text-align: center;"> <p>T 13 N</p> <table border="1"> <tr> <td>R 24 E</td> <td>R 25 E</td> </tr> <tr> <td>S 24</td> <td>S 19</td> </tr> <tr> <td>S 25</td> <td>S 30</td> </tr> </table> <p>1972</p> </div>	R 24 E	R 25 E	S 24	S 19	S 25	S 30
R 24 E	R 25 E						
S 24	S 19						
S 25	S 30						
	<p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>Land, broken and rolling. Soil, sandy loam, and rocky. Timber, juniper and pinon; undergrowth, sagebrush.</p>						
	<p>North, bet. secs. 19 and 24.</p>						
	<p>Asc. over broken land.</p>						

6th G.M. East, T. 13 N., bet. Rs. 24 and 25 E., ____ Mer., (State)

CHAINS	
2.10	Top of ascent; enter scattering timber and dense undergrowth; edge bears E and W.
40.00	Point for the $\frac{1}{4}$ sec. cor. of secs. 19 and 24. Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd. <div style="text-align: center;"> T 13 N $\frac{1}{4}$ R 24 E R 25 E S 24 S 19 1972 </div>
	Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.
56.00	Leave scattering timber; edge bears E and W.
64.20	Arroyo, drains N. 60° W.; asc. 85 ft. to sec. cor.
80.00	Point for the cor. of secs. 13, 18, 19, and 24. Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd. <div style="text-align: center;"> T 13 N R 24 E R 25 E S 13 S 18 S 24 S 19 1972 </div>
	Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.
	Land, broken. Soil, sandy loam, and rocky. Timber, scattering pinon; undergrowth, sagebrush.
	NOTE.— The field notes of the survey of the line bet. secs. 13 and 18, and bet. secs. 7 and 12, continue on the same form and are omitted.
	North, bet. secs. 1 and 6. Desc. 40 ft. over broken NE slope, through dense undergrowth.
7.90	Road, graded, 25 lks. wide, bears N. 80° W. and S. 80° E., from Fort Meyer to Douglass Post Office.
9.10	Right bank of the South Fork Trapper River, course S. 80° E.; banks 2 to 6 ft. high; water at present low stage from 1 to 3 ft. deep; point for the meander cor. of secs. 1 and 6. Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd. <div style="text-align: center;"> MC S 1 S 6 R 24 E R 25 E T 13 N 1972 </div>

MANUAL OF SURVEYING INSTRUCTIONS

6th G.M. East, T. 13 N., bet. Rs. 24 and 25 E., ___ Mer., (State)

CHAINS							
	Raise a mound of stone, 4 ft. base, 2 ft. high, S of cor. Dist. across river by steel tape measurement, 4.60 chs.						
13.70	Left bank of the South Fork Trapper River; point for the meander cor. of secs. 1 and 6. Set a washed flint boulder, 32 x 14 x 8 ins., 24 ins. in the ground, mkd. 1 groove on N, 6 grooves on E, MC on S, and 6 grooves on W face.						
	Raise a mound of stone, 5 ft. base, 3 ft. high, N of cor. Asc. 160 ft. over broken S slope.						
29.80	Ridge, bears E and W; desc. 60 ft. through scattering timber, edge bears E and W.						
40.00	Point for the $\frac{1}{4}$ sec. cor. of secs. 1 and 6, falls on a sandstone boulder, 8 x 5 x 2 ft. above ground. Set a brass tablet, $3\frac{1}{4}$ ins. diam., $3\frac{1}{2}$ -in. stem, in drill hole in boulder, with top mkd.						
	<div style="text-align: center;"> T 13 N $\frac{1}{4}$ <table style="margin: auto;"> <tr> <td>R 24 E</td> <td>R 25 E</td> </tr> <tr> <td>S 1</td> <td>S 6</td> </tr> </table> 1972 </div> from which A pinon, 8 ins. diam., bears S. $54\frac{3}{4}^{\circ}$ E., 297 lks. dist., mkd. $\frac{1}{4}$ S6 BT. A juniper, 9 ins. diam., bears S. 65° W., 84 lks. dist., mkd. $\frac{1}{4}$ S1 BT.	R 24 E	R 25 E	S 1	S 6		
R 24 E	R 25 E						
S 1	S 6						
46.60	Arroyo, drains N. 75° E.; continue over nearly level land.						
67.50	Leave scattering timber; edge bears E and W.						
80.00	Point for the cor. of Tps. 13 and 14 N., Rs. 24 and 25 E. Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.						
	<div style="text-align: center;"> T 14 N <table style="margin: auto;"> <tr> <td>R 24 E</td> <td>R 25 E</td> </tr> <tr> <td>S 36</td> <td>S 31</td> </tr> <tr> <td>S 1</td> <td>S 6</td> </tr> </table> T 13 N 1972 </div> Raise a mound of stone, 5 ft. base, 3 ft. high, S of cor. Land, southern portion broken, balance level. Soil, sandy loam, and rocky. Timber, juniper and pinon; undergrowth, sagebrush.	R 24 E	R 25 E	S 36	S 31	S 1	S 6
R 24 E	R 25 E						
S 36	S 31						
S 1	S 6						

6th G.M. East, T. 16 N., bet. Rs. 24 and 25 E., _____ Mer., (State)

CHAINS

NOTE.— The field notes of the survey of the 6th Guide Mer. E., through Tps. 14, 15, and 16 N., bet. Rs. 24 and 25 E. continue on the same form, and all but the last mile are omitted.

North, bet. secs. 1 and 6.

Asc. 25 ft. along broken W slope, through heavy juniper and pinon timber and dense undergrowth.

3.00 Spur, slopes W; desc. slightly along steep W slope.

12.70 Gulch, course S. 30° W.; asc. 350 ft. along W slope; timber changes to mostly pine.

29.80 Spur, slopes SW; continue ascent of 125 ft. along steep W slope.

40.00 Point for the $\frac{1}{4}$ sec. cor. of secs. 1 and 6.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 12 ins. in the ground to bedrock, and in a mound of stone, 8 ft. base, $1\frac{1}{2}$ ft. high, with brass cap mkd.

```

      T 16 N
      1/4
R 24 E | R 25 E
S 1   | S 6
      1972

```

from which

A yellow pine, 14 ins. diam., bears S. 36 $3/4$ ° E., 54 lks. dist., mkd. $\frac{1}{4}$ S6 BT.

A yellow pine, 12 ins. diam., bears S. 72 $1/4$ ° W., 96 lks. dist., mkd. $\frac{1}{4}$ S1 BT.

Corner falls in a small wash which drains SW. Asc. slightly.

41.00 Spur, slopes W; desc. 125 ft. along W slope.

44.20 Deep draw, drains W; asc. 300 ft. over steep SW slope.

57.00 Top of steep ascent; asc. gradually.

67.00 Divide bet. South Fork and North Fork Trapper River, bears East and S. 75° W.; desc. 225 ft. over NW slope.

81.44 Intersect the Fourth Standard Parallel North; point for the closing cor. of Tps. 16 N., Rs. 24 and 25 E.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 12 ins. in the ground to bedrock, encircled by a mound of stone, 4 ft. base, to top of brass cap, mkd.

```

      T 17 N R 24 E
      S 36
      S 1 | S 6
R 24 E | R 25 E
      T 16 N
      CC
      1972

```

from which

MANUAL OF SURVEYING INSTRUCTIONS

6th G.M. East, T. 16 N., bet. Rs. 24 and 25 E., ___ Mer., (State)

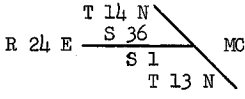
CHAINS	<p>A juniper, 12 ins. diam., bears S. 334° E., 58 lks. dist., mkd. T16N R25E S6 CC BT.</p> <p>A yellow pine, 9 ins. diam., bears S. $72\frac{3}{4}^{\circ}$ W., 129 lks. dist., mkd. T16N R24E S1 CC BT.</p> <p>From this point the stan. $\frac{1}{4}$ sec. cor. on the S. bdy. of sec. 36, T. 17 N., R. 24 E., bears S. $89^{\circ}56'$ E., 12.76 chs. dist., monumented with a sandstone, 12 x 8 x 6 ins. above ground, firmly set, mkd. $\frac{1}{4}$ on N face, with a mound of stone, 3 ft. base, 2 ft. high, N of cor.</p> <p>From the same point the stan. cor. of secs. 35 and 36, T. 17 N., R. 24 E., bears N. $89^{\circ}56'$ W., 27.18 chs. dist., monumented with a sandstone, 14 x 8 x 8 ins. above the top of a mound of stone, 4 ft. base, 2 ft. high, mkd. with 1 groove on E and 5 grooves on W face, with a mound of stone, 3 ft. base, 2 ft. high, N of cor.</p> <p>Land, mountainous. Soil, sandy and rocky. Timber, yellow pine, juniper, and pinon; undergrowth, service and oak brush.</p> <p style="text-align: center;">MEMORANDUM</p> <p>A summary description of the region crossed by a guide meridian is supplied at the end of the field notes, or it may be included in the general description of the subdivisional survey.</p> <p style="text-align: center;">(West Boundary of T. 13 N., R. 24 E.)</p> <p>NOTE.— The field notes of the survey of a meridi- onal township boundary ordinarily take the form of the specimen field notes of the 6th Guide Meridian East, with only one set of measurements. The specimen field notes for the survey of this boundary are omitted.</p> <p style="text-align: center;">North Boundary of T. 13 N., R. 24 E., ___ Meridian, (State)</p> <p>NOTE.— Latitudinal township boundaries are general- ly run by the random and true method, but the random line is not described in the field notes unless required for some special circumstance. Detail of the random line is given here to show the form.</p> <p>May 19, 1972, at the cor. of Tps. 13 and 14 N., Rs. 24 and 25 E., in latitude $37^{\circ}04.8'$ N., and longitude $104^{\circ}38.3'$ W., as computed by reference to the values given for the stan. cor. of Tps. 13 N., Rs. 24 and 25 E., turn 90° from flag point previously located on the 6th Guide Meridian East, and run</p> <p>West, on a random line, making proper offsets to the north from the tangent to the parallel at intervals of 40.00 chs., setting temp. $\frac{1}{4}$ sec. and sec. cors. on the line bet. Tps. 13 and 14 N., R. 24 E. At 479.25 chs. the parallel falls 25 lks. South of the cor. of Tps. 13 and 14 N., Rs. 23 and 24 E. The correction is 4.2 lks. North per mile, counting from the point of beginning.</p> <p>Thence S. $89^{\circ}58'$ E., bet. secs. 6 and 31, marking and blazing the true line.</p>
--------	---

N. Bdy. of T. 13 N., R. 24 E., ___ Mer., (State)

CHAINS	
	Asc. over SW slope, through dense growth of sagebrush.
30.25	Ridge, bears N. 15° E. and S. 15° W.
34.00	Head of draw, drains S.
39.25	Point for the $\frac{1}{4}$ sec. cor. of secs. 6 and 31. Set an iron post, 28 ins. long, 2 $\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd. $\begin{array}{r} T\ 14\ N\ R\ 24\ E \\ \quad \quad S\ 31 \\ \quad \quad \hline \quad \quad S\ 6 \\ T\ 13\ N \end{array}$ 1972 Raise a mound of stone, 5 ft. base, 3 ft. high, N of cor.
46.90	Ridge, bears N. 15° E. and S. 15° W.; desc. 100 ft. over gradual E slope.
77.50	Draw, drains NE; asc. gradually.
79.25	Point for the cor. of secs. 5, 6, 31, and 32. Set an iron post, 28 ins. long, 2 $\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd. $\begin{array}{r} T\ 14\ N\ R\ 24\ E \\ S\ 31\ S\ 32 \\ \hline S\ 6\ S\ 5 \\ T\ 13\ N \end{array}$ 1972 Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor. Land, rolling mountainous. Soil, sandy. No timber; heavy cover of sagebrush.
	S. 89° 58' E., bet. secs. 5 and 32. Over rolling N slope, changing to E slope; through dense growth of sagebrush.
29.50	Gulch, drains SE; asc. to spur.
35.50	Spur, slopes S; leave sagebrush and enter scattering timber; desc. gradually.
40.00	Point for the $\frac{1}{4}$ sec. cor. of secs. 5 and 32. Set a sandstone, 24 x 8 x 6 ins., 16 ins. in the ground, mkd. $\frac{1}{4}$ on N face. Dig pits 18 x 18 x 12 ins., E and W of stone, 3 ft. dist.
44.50	Draw, drains S; asc. gradually.
53.00	Top of slope; desc. 50 ft. to creek.
60.00	Crooked Wash Creek, dry, 30 lks. wide, course S. 20° W.; asc. 150 ft.
77.00	Ridge, bears N and S; desc. gradually to cor.

MANUAL OF SURVEYING INSTRUCTIONS

N. Bdy. of T. 13 N., R. 24 E., ___ Mer., (State)

CHAINS 80.00	<p>Point for the cor. of secs. 4, 5, 32, and 33.</p> <p>Set a sandstone, 20 x 10 x 8 ins., 13 ins. in the ground, mkd. with 4 notches on E and 2 notches on W edge</p> <p>from which</p> <p style="padding-left: 40px;">A juniper, 20 ins. diam., bears N. 36° W., 423 lks. dist., mkd. T14N R24E S32 BT.</p> <p>No other suitable bearing trees available.</p> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>Land, rolling mountainous. Soil, sandy and rocky. Timber, scattering juniper; undergrowth, sagebrush.</p>
	<p>NOTE.— The field notes of the survey of the line bet. secs. 4 and 33, 3 and 34, and 2 and 35 continue on the same form and are omitted.</p>
	<p>S. 89°58' E., bet. secs. 1 and 36.</p> <p>Desc. gradually through heavy pinon timber and dense undergrowth.</p>
11.40	<p>Road, graded, 25 lks. wide, bears N. 55° W. and S. 55° E., from Fort Meyer to Douglass Post Office.</p>
16.20	<p>Right bank of the South Fork Trapper River, course S. 50° E.; banks 2 to 5 ft. high, water at present low stage from 1 to 3 ft. deep; point for the meander cor. of secs. 1 and 36.</p>
	<p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>
	<div style="text-align: center;">  <p>1972</p> </div>
	<p>from which</p> <p style="padding-left: 40px;">A juniper, 14 ins. diam., bears N. 76¼° W., 142 lks. dist., mkd. T14N R24E S36 MC BT.</p> <p style="padding-left: 40px;">A juniper, 10 ins. diam., bears S. 21 3/4° W., 98 lks. dist., mkd. T13N R24E S1 MC BT.</p> <p>Width of river about 4.50 chs.; dist. across on line by steel tape measurement, 7.15 chs.</p>
23.35	<p>Left bank of the South Fork Trapper River; point for the meander cor. of secs. 1 and 36.</p> <p>Set a washed flint boulder, 28 x 16 x 8 ins., 21 ins. in the ground, mkd.</p> <p style="padding-left: 40px;">6 grooves on N, 1 groove on E, 6 grooves on S, and MC on W face.</p> <p>Raise a mound of stone, 5 ft. base, 3 ft. high, E of cor.</p>

N. Bdy. of T. 13 N., R. 24 E., ____ Mer., (State)

CHAINS	
40.00	<p>Asc. 150 ft. over broken SW slope, through scattering pinon timber.</p> <p>Point for the $\frac{1}{4}$ sec. cor. of secs. 1 and 36.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 14 N R 24 E</p> <p>$\frac{1}{4}$ $\frac{S\ 36}{S\ 1}$</p> <p>T 13 N</p> <p>1972</p> </div> <p>from which</p> <p style="padding-left: 40px;">A pinon, 9 ins. diam., bears S. $29\frac{1}{2}^{\circ}$ W., 387 lks. dist., mkd. $\frac{1}{4}$ S1 BT.</p> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, N of cor.</p>
45.70	Ridge and edge of heavy timber, bear NW and SE; desc. 35 ft.; timber changes to pine, spruce, and fir.
65.20	Base of slope and edge of timber, bear NW and SE; leave timber; continue over nearly level land.
80.00	<p>The cor. of Tps. 13 and 14 N., Rs. 24 and 25 E.</p> <p>Land, mostly broken; eastern part nearly level. Soil, sandy loam, and rocky. Timber, juniper, pinon, yellow pine, blue spruce, and fir; undergrowth, sagebrush.</p>
	<p style="text-align: center;">MEMORANDUM</p> <p>A summary description of the region crossed by the township exteriors is supplied at the close of the field notes except where it may be included in the general description of the subdivisional survey.</p>

SPECIMEN
FIELD NOTES
OF THE SURVEY OF THE
SUBDIVISIONAL AND MEANDER LINES
OF
TOWNSHIP 15 NORTH, RANGE 20 EAST,
Of the PRINCIPAL Meridian
In the State of MONTANA

EXECUTED BY

Robert Acres, Cadastral Surveyor

Under special instructions dated April 1, 1972, which provided for the surveys included under Group Number 123, approved April 10, 1972, and assignment instructions dated May 20, 1972.

Survey commenced June 1, 1972

Survey completed June 30, 1972

INDEX TO SPECIMEN FIELD NOTES

T. 15 N., R. 20 E.

6	5	4	3	2	1
				265	264
7	8	9	10	11	12
272	271			263	262
18	17	16	15	14	13
275	276				
19	20	21	22	23	24
270		267			261
30	29	28	27	26	25
269	269			266	259
31	32	33	34	35	36
268		276	265	258	

Ivy Island _____ page 272
 Diamond Rock _____ page 274
 Lake City Townsite _____ page 278

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p>The boundaries of the township have been established by earlier surveys as follows:</p> <p>The north boundary was surveyed by _____ in _____. The south and east boundaries were surveyed by _____ in _____. The west boundary was surveyed by _____ in _____.</p> <p>The following field notes are those of the survey of the subdivisional lines and meander lines of Township 15 North, Range 20 East, Principal Meridian, Montana.</p> <p>The survey was executed in accordance with specifications set forth in the Manual of Surveying Instructions, 1972, and the Special Instructions for Group No. 123, dated April 1, 1972.</p> <p>The directions of lines were determined by the solar transit method and by means of lines projected by fore- and backsights from azimuths obtained by direct solar observations or observations on Polaris.</p> <p>The geographic position of the southeast corner of the township as determined by a tie to the United States Coast and Geodetic Survey triangulation station "FIAT TOP" is as follows:</p> <p style="padding-left: 40px;">Latitude $45^{\circ}45.4'$ N. Longitude $107^{\circ}54.3'$ W.</p> <p>The mean magnetic declination is $18^{\circ}10'$ E.</p>
	<p>Beginning at the cor. of secs. 1, 2, 35, and 36, on the S. bdy. of the Tp., monumented with a sandstone, 8 x 6 x 5 ins. above ground, firmly set, mkd. with 1 notch on E and 5 notches on W edge, from which the original bearing trees</p> <p style="padding-left: 40px;">A sawed cottonwood stump, 14 ins. diam., bears N. 10° E., 25 lks. dist., with the marks T15N visible on opened blaze.</p> <p style="padding-left: 40px;">A cottonwood, 10 ins. diam., bears S. 55° E., 10 lks. dist., with healed blaze.</p> <p style="padding-left: 40px;">A green ash, 13 ins. diam., bears S. 35° W., 33 lks. dist., with fragmentary scribe marks visible on open and partly rotted blaze.</p> <p style="padding-left: 40px;">A cottonwood, 12 ins. diam., bears N. 25° W., 50 lks. dist., with healed blaze.</p> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, W of cor. N. $0^{\circ}01'$ W., bet. secs. 35 and 36.</p> <p>Over level bottom land.</p>
20.00	Enter scattering timber; edge bears N and S.
29.30	SE cor. of field; leave scattering timber.
31.50	NE cor. of cabin, 15 x 12 ft., bears West, 6.15 chs. dist.; long side bears N. 10° E. and S. 10° W.
39.50	Enter State Highway No. 25, 35 lks. wide, bears North along sec. line, and East.
40.00	Point for the $\frac{1}{4}$ sec. cor. of secs. 35 and 36.

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS					
	<p>Bury a granite stone, 12 x 12 x 12 ins., mkd. X, 2 ft. below surface of highway, from which</p> <p>An iron post, 28 ins. long, 2½ ins. diam., set 24 ins. in the ground, for a reference monument, bears East, 46 lks. dist., with brass cap mkd. ¼ S36 RM 1972 and an arrow pointing to the cor.</p> <p>An iron post, 28 ins. long, 2½ ins. diam., set 24 ins. in the ground, for a reference monument, bears West, 46 lks. dist., with brass cap mkd. ¼ S35 RM 1972 and an arrow pointing to the cor.</p>				
51.50	Leave highway, bears N. 70° W. and South.				
57.50	Enter heavy timber and dense undergrowth, edge bears N. 54° E. and S. 54° W.				
72.00	Leave undergrowth; continue through heavy timber.				
80.00	Point for the cor. of secs. 25, 26, 35, and 36.				
	<p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N R 20 E</p> <table border="1" style="margin: auto;"> <tr> <td>S 26</td><td>S 25</td></tr> <tr> <td>S 35</td><td>S 36</td></tr> </table> <p>1972</p> </div> <p>from which</p> <p>A green ash, 13 ins. diam., bears N. 22° E., 26 lks. dist., mkd. T15N R20E S25 BT.</p> <p>A green ash, 23 ins. diam., bears S. 71¼° E., 37 lks. dist., mkd. T15N R20E S36 BT.</p> <p>A green ash, 17 ins. diam., bears S. 64° W., 41 lks. dist., mkd. T15N R20E S35 BT.</p> <p>A cottonwood, 13 ins. diam., bears N. 21¼° W., 36 lks. dist., mkd. T15N R20E S26 BT.</p> <p>Land, level bottom; northern 20 chs. subject to overflow. Soil, alluvial, silt and loam. Timber, green ash and cottonwood; undergrowth, willow.</p>	S 26	S 25	S 35	S 36
S 26	S 25				
S 35	S 36				
	<p>From the cor. of secs. 25, 30, 31, and 36, on the E. bdy. of the Tp., monumented with a sandstone, 8 x 5 x 5 ins. above ground, firmly set, mkd. with 1 notch on S and 5 notches on N edge, from which the original bearing tree</p> <p>A green ash, 20 ins. diam., bears S. 15° E., 32 lks. dist., with healed blaze.</p> <p>N. 89°56' W., bet. secs. 25 and 36.</p> <p>Over level bottom land, through scattering timber.</p>				
16.20	Cherry Creek, 12 lks. wide, course NW.				
39.98	Point for the ¼ sec. cor. of secs. 25 and 36.				
	<p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>				

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p style="text-align: center;">T 15 N R 20 E</p> <p style="text-align: center;">$\frac{1}{4}$ $\frac{S\ 25}{S\ 36}$</p> <p style="text-align: center;">1972</p> <p>from which</p> <p>A green ash, 8 ins. diam., bears N. $64\ 3/4^\circ$ W., 124 lks. dist., mkd. $\frac{1}{4}$ S25 BT.</p> <p>A green ash, 7 ins. diam., bears S. $65\ 1/4^\circ$ W., 189 lks. dist., mkd. $\frac{1}{4}$ S36 BT.</p> <p>79.96 The cor. of secs. 25, 26, 35, and 36.</p> <p>Land, level, mostly subject to overflow. Soil, alluvial, silt and loam. Timber, green ash and cottonwood; undergrowth, willow.</p>
	<p>N. $0^\circ 01'$ W., bet. secs. 25 and 26.</p> <p>Over level bottom land, through heavy timber.</p> <p>25.36 Right bank of Yellowstone River, course N. 81° E.; banks 2 to 12 ft. high; water is high at present stage and from 1 to 8 ft. deep; point for the meander cor. of secs. 25 and 26.</p> <p>Set an iron post, 28 ins. long, $2\ 1/2$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">MC</p> <p style="text-align: center;">S 26 S 25</p> <p style="text-align: center;">T 15 N R 20 E</p> <p style="text-align: center;">1972</p> <p>from which</p> <p>A cottonwood, 12 ins. diam., bears S. $18\ 1/4^\circ$ E., 16 lks. dist., mkd. T15N R20E S25 MC BT.</p> <p>A green ash, 11 ins. diam., bears S. $74\ 1/2^\circ$ W., 25 lks. dist., mkd. T15N R20E S26 MC BT.</p> <p>Dist. across river 24.10 chs. by triangulation.</p> <p style="text-align: center;">[Detail omitted]</p>
49.46	<p>Left bank of Yellowstone River; point for the meander cor. of secs. 25 and 26.</p> <p>Set a washed granite boulder, $3\ 1/4 \times 9 \times 7$ ins., 24 ins. in the ground, mkd.</p> <p>5 grooves on N, 1 groove on E, MC on S, and 5 grooves on W face</p> <p>from which</p>

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

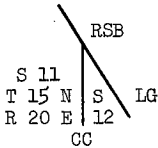
CHAINS							
	<p>A green ash, 10 ins. diam., bears N. $34\frac{1}{4}^{\circ}$ E., 228 lks. dist., mkd. T15N R20E S25 MC BT.</p> <p>Raise a mound of stone, 5 ft. base, 3 ft. high, N of cor.</p> <p>Enter scattering timber, edge bears N. 81° E. and S. 81° W.</p> <p>52.60 Top of bluff, 20 ft. high, bears E and W; leave timber.</p> <p>63.80 Telephone line, bears E and W.</p> <p>80.00 Point for the cor. of secs. 23, 24, 25, and 26.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N R 20 E</p> <table> <tr> <td>S 23</td><td>S 24</td></tr> <tr> <td>S 26</td><td>S 25</td></tr> </table> <p>1972</p> </div> <p>Dig pits, 18 x 18 x 12 ins., in each sec., 3 ft. dist.</p> <p>Land, nearly level; 52 chs. bottom land subject to over- flow.</p> <p>Soil, alluvial, silt and loam, and sandy.</p> <p>Timber, green ash and cottonwood; undergrowth, willow.</p>	S 23	S 24	S 26	S 25		
S 23	S 24						
S 26	S 25						
	<p>From the cor. of secs. 19, 24, 25, and 30, on the E. bdy. of the Tp., monumented with a sandstone, 12 x 9 x 5 ins., loosely set at the E side of a small mound of stone, poor- ly mkd. with 4 notches on N and 2 notches on S edge.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N</p> <table> <tr> <td>R 20 E</td><td>R 21 E</td></tr> <tr> <td>S 24</td><td>S 19</td></tr> <tr> <td>S 25</td><td>S 30</td></tr> </table> <p>1972</p> </div> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, W of cor.</p> <p>Bury the mkd. stone alongside the iron post.</p> <p>N. $89^{\circ}55'$ W., bet. secs. 24 and 25.</p> <p>Over level land.</p> <p>38.00 NE cor. of Fletcher's service station, bears South, 8.03 chs. dist.</p> <p>39.99 Point for the $\frac{1}{4}$ sec. cor. of secs. 24 and 25.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>	R 20 E	R 21 E	S 24	S 19	S 25	S 30
R 20 E	R 21 E						
S 24	S 19						
S 25	S 30						

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p style="text-align: center;">T 15 N R 20 E</p> <p style="text-align: center;">$\frac{1}{4}$ $\frac{S 24}{S 25}$</p> <p style="text-align: center;">1972</p> <p>Dig pits, 18 x 18 x 12 ins., E and W of post, 3 ft. dist.</p> <p>70.00 U.S. Highway No. 87, 40 lks. wide, bears N. 73° W. and S. 73° E.</p> <p>79.98 The cor. of secs. 23, 24, 25, and 26.</p> <p>Land, level. Soil, sandy. No timber or undergrowth.</p>
	<p>NOTE. — The field notes continue in the regular order and in the same form; the record of 3 miles omitted.</p>
	<p>From the cor. of secs. 7, 12, 13, and 18, on the E. bdy. of the Tp., monumented with a sandstone, 8 x 8 x 5 ins. above ground, firmly set, mkd. with 2 notches on N and 4 notches on S edge, with a mound of stone, 2 ft. base, 1½ ft. high, W of cor.</p> <p>N. 89°52' W., bet. secs. 12 and 13.</p> <p>Over nearly level land.</p>
31.49	<p>Intersect the NE bdy. of the Rancho San Blas grant.</p> <p>Point for the closing cor. of secs. 12 and 13.</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>
	<p style="text-align: center;"> </p> <p style="text-align: center;">T 15 N</p> <p style="text-align: center;">S 12</p> <p style="text-align: center;">S 13 CC</p> <p style="text-align: center;">R 20 E</p> <p style="text-align: center;">1972</p> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, E of cor.</p> <p>From this point the 5th Mi. Cor. of the grant bdy. bears S. 33°00' E., 7.00 chs. dist., monumented with a limestone, 15 x 8 x 5 ins. above ground, firmly set, mkd. RSB LG on W and 5 M on E face, with a mound of stone, 2 ft. base, 1½ ft. high, SW of cor.</p> <p>Thence on a blank line across the grant.</p>
40.015	<p>Point for the ¼ sec. cor. of secs. 12 and 13; no permanent monument established.</p>
67.07	<p>Intersect the SW bdy. of the grant.</p> <p>Point for the closing cor. of secs. 12 and 13.</p> <p>Set a granite stone, 25 x 7 x 6 ins., 16 ins. in the ground, mkd.</p>

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p>2 grooves on N, RSB LG on E, 4 grooves on S, and CC and 6 grooves on W face.</p> <p>Raise a mound of stone, 2 ft. base, 1½ ft. high, W of cor.</p> <p>From this point the ¾ Mi. Cor. of the grant bdy. bears N. 19°30' W., 12.00 chs. dist., monumented with a flint stone, 12 x 8 x 6 ins. above ground, firmly set, mkd. RSB LG on E and ¾ M on W face, with a mound of stone, 2 ft. base, 1½ ft. high, NE of cor.</p> <p>The closing cor. is located on the top of a ridge bearing N. 15° W. and S. 15° E.; thence over rough, rocky ground.</p>
76.00	Begin descent over broken SW slope.
80.03	The cor. of secs. 11, 12, 13, and 14.
	<p>Land, eastern part, level; western part, mountainous. Soil, sandy loam and rocky. No timber or undergrowth.</p>
	<p>N. 0°01' W., bet. secs. 11 and 12.</p> <p>Asc. over broken SW slope.</p>
11.00	Top of ascent, bears N. 50° W. and S. 50° E.; thence over nearly level land.
36.60	Intersect the SW bdy. of the Rancho San Blas grant.
	<p>Point for the closing cor. of secs. 11 and 12.</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>
	 <p>1972</p>
	<p>from which</p> <p>A juniper, 20 ins. diam., bears S. 34½° W., 484 lks. dist., mkd. T15N R20E S11 CC BT.</p>
	<p>Raise a mound of stone, 2 ft. base, 1½ ft. high, S of cor.</p> <p>From this point Cor. No. 7 of the grant bdy. bears N. 19°30' W., 7.40 chs. dist., monumented with a granite boulder, 6 x 4 x 1½ ft. above ground, mkd. COR 7 RSB LG on E face, with a mound of stone, 2 ft. base, 1½ ft. high, NE of cor.</p> <p>Thence on a blank line across the grant.</p>
40.00	Point for the ¼ sec. cor. of secs. 11 and 12; no permanent monument established.
44.32	Intersect the NW bdy. of the grant.
	Point for the closing cor. of secs. 11 and 12.

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS					
	<p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 15 ins. in the ground to bedrock, encircled by a mound of stone, 4 ft. base, to top, with brass cap mkd.</p> <div style="text-align: center;"> <p>CC</p> <table border="1"> <tr> <td>T 15 N</td><td>R 20 E</td></tr> <tr> <td>S 11</td><td>S 12</td></tr> </table> <p>RSB LG</p> <p>1972</p> </div> <p>Deposit a granite stone, 10 x 7 x 6 ins., mkd. X, alongside the iron post, as a memorial.</p> <p>From this point Cor. No. 7 of the grant bdy. bears S. $73^{\circ}00'$ W., 2.58 chs. dist., previously described.</p> <p>Thence over rolling ground.</p> <p>60.80 Creek, 6 lks. wide, course SE.</p> <p>80.00 Point for the cor. of secs. 1, 2, 11, and 12.</p> <p>Set a granite stone, 24 x 10 x 7 ins., 16 ins. in the ground, mkd. with 1 notch on E and 5 notches on S edge.</p> <p>Raise a mound of stone, 2 ft. base, $1\frac{1}{2}$ ft. high, W of cor.</p> <p>Land, mountainous and rolling. Soil, sandy clay and rocky. Timber, a few scattering junipers; no undergrowth.</p> <p>From the cor. of secs. 1, 6, 7, and 12, on the E. bdy. of the Tp., monumented with a burr oak, 12 ins. diam., with healed blazes on NE, SE, SW, and NW sides, and with a mound of stone, 2 ft. base, $1\frac{1}{2}$ ft. high, W of cor.</p> <p>N. $89^{\circ}49'$ W., bet. secs. 1 and 12.</p> <p>Over rolling land.</p> <p>3.50 Enter grove of heavy timber, edge bears N and S. 20° W.</p> <p>18.07 A burr oak, 12 ins. diam., on line, mkd. with two hacks each, on E and W sides.</p> <p>40.02 Point for the $\frac{1}{4}$ sec. cor. of secs. 1 and 12.</p> <p>Set a granite stone, 28 x 11 x 9 ins., 18 ins. in the ground, mkd. $\frac{1}{4}$ on N face</p> <p>from which</p> <p style="padding-left: 40px;">A burr oak, 9 ins. diam., bears N. $19\frac{1}{2}^{\circ}$ W., 22 lks. dist., mkd. $\frac{1}{4}$ S1 BT.</p> <p style="padding-left: 40px;">A burr oak, 11 ins. diam., bears S. $65\frac{3}{4}^{\circ}$ W., 129 lks. dist., mkd. $\frac{1}{4}$ S12 BT.</p> <p>41.10 Ravine, course S. 20° W.</p> <p>49.60 Ravine, course S. 30° W.</p> <p>69.00 Leave timber, edge bears NE and SE.</p> <p>80.04 The cor. of secs. 1, 2, 11, and 12.</p>	T 15 N	R 20 E	S 11	S 12
T 15 N	R 20 E				
S 11	S 12				

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	Land, rolling mountainous. Soil, sandy clay and rocky. Timber, burr oak; no undergrowth.
	N. 0° 02' E., bet. secs. 1 and 2. Desc. slightly over rolling land.
40.00	Point for the $\frac{1}{4}$ sec. cor. of secs. 1 and 2. Set a limestone, 20 x 10 x 6 ins., 13 ins. in the ground, mkd. $\frac{1}{4}$ on W face. Raise a mound of stone, 3 ft. base, 2 ft. high, W of cor.
49.30	Arroyo, course N. 70° E.
79.77	Intersect N. bdy. of the Tp. at the cor. of secs. 1, 2, 35, and 36, monumented with a limestone, 16 x 6 x 5 ins., loosely set, mkd. with 1 notch on E and 5 notches on W edge, with a small mound of stone, 2 ft. base, 1 $\frac{1}{2}$ ft. high, W of cor. At the cor. point Set an iron post, 28 ins. long, 2 $\frac{1}{2}$ ins. diam., 10 ins. in the ground to bedrock, encircled by a mound of stone, 4 ft. base, to top, with brass cap mkd. <div data-bbox="643 850 797 1027" style="text-align: center;"> T 16 N R 20 E S 35 S 36 S 2 S 1 T 15 N 1972 </div>
	Bury the marked stone alongside the iron post. Land, rolling mountainous. Soil, sandy clay. No timber or undergrowth.
40.00	From the cor. of secs. 2, 3, 34, and 35, on the S. bdy. of the Tp., monumented with a sandstone, 14 x 8 x 8 ins. above ground, firmly set, mkd. with 2 notches on the E and 4 notches on the W edge, with a mound of stone, 2 ft. base, 1 $\frac{1}{2}$ ft. high, W of cor. N. 0°02' W., bet. secs. 34 and 35. Over level bottom land. Point for the $\frac{1}{4}$ sec. cor. of secs. 34 and 35. Set a sandstone, 28 x 10 x 8 ins., 21 ins. in the ground, mkd. $\frac{1}{4}$ on W face. Raise a mound of stone, 4 ft. base, 3 ft. high, W of cor.
42.00	Leave bottom land, edge bears N. 70° E. and S. 70° W.; asc. sandy ridge.
46.00	Top of windblown sandy ridge, bears N. 70° E. and S. 70° W.
50.00	Foot of sandy ridge; thence over nearly level land.

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS					
80.00	<p>Point for the cor. of secs. 26, 27, 34, and 35.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., in a concrete form, 8 ins. upper diam., 14 ins. lower diam., 30 ins. long, 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N R 20 E</p> <table border="1"> <tr> <td>S 27</td><td>S 26</td></tr> <tr> <td>S 34</td><td>S 35</td></tr> </table> <p>1972</p> </div> <p>Bury a sandstone, 8 x 8 x 6 ins., mkd. X, at N side of concrete monument.</p> <p>Land, south half, level bottom subject to overflow; north half, level sandy plain. Soil, alluvial, silt and loam. No timber or undergrowth.</p>	S 27	S 26	S 34	S 35
S 27	S 26				
S 34	S 35				
40.00	S. $89^{\circ}57'$ E., on a random line bet. secs. 26 and 35.				
48.13	<p>Set temp. $\frac{1}{4}$ sec. cor.</p> <p>Left bank of river; set temp. meander cor.</p> <p>Dist. across river 18.19 chs. by triangulation.</p> <p style="text-align: center;">[Details omitted]</p>				
66.32	Right bank of river; set temp. meander cor.				
80.06	Fall 3 lks. South of cor. of secs. 25, 26, 35, and 36.				
13.74	<p>Thence N. $89^{\circ}58'$ W., on true line bet. secs. 26 and 35.</p> <p>Over level bottom land, through heavy timber.</p> <p>Right bank of Yellowstone River, course N. 20° W.; banks 2 to 10 ft. high; water is high at present stage and from 1 to 8 ft. deep; point for the meander cor. of secs. 26 and 35.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N</p> <table border="1"> <tr> <td>MC</td><td>S 26</td></tr> <tr> <td></td><td>S 35</td></tr> </table> <p>R 20 E</p> <p>1972</p> </div> <p>from which</p> <p>A green ash, 9 ins. diam., bears N. $49\frac{1}{4}^{\circ}$ E., 26 lks. dist., mkd. T15N R20E S26 MC BT.</p> <p>A cottonwood, 13 ins. diam., bears S. $38\frac{1}{2}^{\circ}$ E., 21 lks. dist., mkd. T15N R20E S35 MC BT.</p>	MC	S 26		S 35
MC	S 26				
	S 35				
31.93	Left bank of Yellowstone River; point for the meander cor. of secs. 26 and 35.				

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p>Set a washed granite boulder, 40 x 12 x 8 ins., 30 ins. in the ground, mkd.</p> <p>5 grooves on N, MC on E, 1 groove on S, and 5 grooves on W face.</p> <p>Raise a mound of stone, 5 ft. base, 3 ft. high, W of cor.</p> <p>Asc. gradually through scattering timber.</p>
37.50	Leave timber.
40.03	<p>Point for the $\frac{1}{4}$ sec. cor. of secs. 26 and 35.</p> <p>Set a granite stone, 24 x 12 x 8 ins., 16 ins. in the ground, mkd. $\frac{1}{4}$ on N face, from which</p> <p>A green ash, 14 ins. diam., bears N. 28 $3/4^{\circ}$ E., 328 lks. dist., mkd. $\frac{1}{4}$ S26 BT.</p> <p>A green ash, 9 ins. diam., bears S. 78$^{\circ}$ E., 278 lks. dist., mkd. $\frac{1}{4}$ S35 BT.</p>
70.50	State Highway No. 25, 35 lks. wide, bears N. 68 $^{\circ}$ W. and S. 68 $^{\circ}$ E.
80.06	<p>The cor. of secs. 26, 27, 34, and 35.</p> <p>Land, east of river, level bottom subject to overflow; west of river, level upland. Soil, alluvial, silt and loam. Timber, green ash and cottonwood; undergrowth, willow.</p>
	<p>NOTE.— The field notes continue in the regular order and in the same form; the record of 13 miles is omitted.</p>
	<p>N. 0$^{\circ}$03' W., bet. secs. 21 and 22.</p> <p>Over level land.</p>
13.90	Enter marsh, edge bears N. 60 $^{\circ}$ E. and N. 80 $^{\circ}$ W.
40.00	<p>Point for the $\frac{1}{4}$ sec. cor. of secs. 21 and 22.</p> <p>Set a brass tablet, $3\frac{1}{4}$ ins. diam., $3\frac{1}{2}$ in. stem, in a cylindrical concrete form, 30 ins. long, 6 ins. diam., 24 ins. in the ground, with top mkd.</p> <p style="text-align: center;">T 15 N R 20 E $\frac{1}{4}$ S 21 S 22 1972</p> <p>Set a creosoted wood post, 7 ft. long, 8 x 6 ins. cross section, 3 ft. in ground, at W side of concrete monument.</p>
53.60	Leave marsh, edge bears N. 30 $^{\circ}$ W. and S. 60 $^{\circ}$ E.
80.00	Point for the cor. of secs. 15, 16, 21, and 22.

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	<p>Set a brass tablet, $\frac{3}{4}$ ins. diam., $\frac{3}{8}$-in. stem, in a concrete form, 8 ins. upper diam., 1$\frac{1}{4}$ ins. lower diam., 30 ins. long, 2$\frac{1}{2}$ ins. in the ground, with top mkd.</p> <div style="text-align: center;"> $\begin{array}{c} T\ 15\ N\ R\ 20\ E \\ \hline S\ 16\ \ S\ 15 \\ \hline S\ 21\ \ S\ 22 \\ \hline 1972 \end{array}$ </div> <p>No suitable bearing trees or bearing objects available within limits.</p> <p>Land, level; swamp and overflowed, 39.70 chs. Soil, rich loam. No timber or undergrowth.</p> <p>NOTE.— The field notes continue in the regular order and in the same form; the record of 17 miles is omitted.</p> <p>From the cor. of secs. 5, 6, 31, and 32, on the S. bdy. of the Tp., monumented with a limestone, 15 x 8 x 6 ins., lying on the surface at E side of a small mound of stone, poorly marked with 5 notches on one edge and 1 notch on the opposite edge.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., 2$\frac{1}{2}$ ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> $\begin{array}{c} T\ 15\ N\ R\ 20\ E \\ \hline S\ 31\ \ S\ 32 \\ \hline S\ 6\ \ S\ 5 \\ \hline T\ 14\ N \\ \hline 1972 \end{array}$ </div> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>Bury the mkd. stone alongside the iron post.</p> <p>N. 0°05' W., bet. secs. 31 and 32.</p> <p>Over level land.</p> <p>40.00 Point for the $\frac{1}{4}$ sec. cor. of secs. 31 and 32.</p> <p>Set a brass tablet, $\frac{3}{4}$ ins. diam., $\frac{3}{8}$-in. stem, in a cylindrical concrete form, 36 ins. long, 6 ins. diam., 2$\frac{1}{2}$ ins. in the ground, with top mkd.</p> <div style="text-align: center;"> $\begin{array}{c} T\ 15\ N\ R\ 20\ E \\ \hline \frac{1}{4} \\ \hline S\ 31\ \ S\ 32 \\ \hline 1972 \end{array}$ </div> <p>Bury 6 fragments of blue crockery at the base of the concrete monument.</p> <p>80.00 Point for the cor. of secs. 29, 30, 31, and 32.</p>
--------	---

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	<p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">T 15 N R 20 E</p> <table style="margin-left: auto; margin-right: auto;"> <tr> <td>S 30</td><td>S 29</td></tr> <tr> <td>S 31</td><td>S 32</td></tr> </table> <p style="text-align: center;">1972</p> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, W of cor.</p> <p>Land, level. Soil, sandy. No timber or undergrowth.</p> <hr/> <p>From the cor. of secs. 28, 29, 32, and 33.</p> <p>N. $89^{\circ}54'$ W., bet. secs. 29 and 32.</p> <p>Over level land.</p> <p>14.50 Base of slope, edge bears N. 30° E. and S. 30° W.</p> <p>16.50 Top of slope.</p> <p>28.50 Spring, bears South, 2.50 chs. dist.</p> <p>39.98 Point for the $\frac{1}{4}$ sec. cor. of secs. 29 and 32.</p> <p>Set a brass tablet, $3\frac{1}{4}$ ins. diam., $3\frac{1}{2}$ in. stem, in a cylindrical concrete form, 30 ins. long, 6 ins. diam., 24 ins. in the ground, with top mkd.</p> <p style="text-align: center;">T 15 N R 20 E</p> <table style="margin-left: auto; margin-right: auto;"> <tr> <td>$\frac{1}{4}$</td><td>S 29</td></tr> <tr> <td></td><td>S 32</td></tr> </table> <p style="text-align: center;">1972</p> <p>Bury a cast-iron stove lid, 8 ins. diam., $\frac{1}{2}$ in. thick, at the base of the concrete monument.</p> <p>79.96 The cor. of secs. 29, 30, 31, and 32.</p> <p>Land, level. Soil, sandy. No timber or undergrowth.</p> <hr/> <p>N. $89^{\circ}57'$ W., bet. secs. 30 and 31.</p> <p>Over level land.</p> <p>40.00 Point for the $\frac{1}{4}$ sec. cor. of secs. 30 and 31.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">T 15 N R 20 E</p> <table style="margin-left: auto; margin-right: auto;"> <tr> <td>$\frac{1}{4}$</td><td>S 30</td></tr> <tr> <td></td><td>S 31</td></tr> </table> <p style="text-align: center;">1972</p> <p>Dig pits, 18 x 18 x 12 ins., E and W of cor., 3 ft. dist.</p>	S 30	S 29	S 31	S 32	$\frac{1}{4}$	S 29		S 32	$\frac{1}{4}$	S 30		S 31
S 30	S 29												
S 31	S 32												
$\frac{1}{4}$	S 29												
	S 32												
$\frac{1}{4}$	S 30												
	S 31												

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS							
78.35	<p>Intersect the W. bdy. of the Tp., at the cor. of secs. 25, 30, 31, and 36, identified by traces of four pits, one in each sec., NE, SE, SW, and NW, with a part of the original corner stake bearing fragmentary scribe marks lying in the SE pit.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N</p> <table border="1"> <tr> <td>R 19 E</td><td>R 20 E</td></tr> <tr> <td>S 25</td><td>S 30</td></tr> <tr> <td>S 36</td><td>S 31</td></tr> </table> <p>1972</p> </div> <p>Deposit a sandstone, 6 x 6 x 6 ins., mkd. X, at the base of the iron post, as a memorial, and bury the old stake alongside.</p> <p>Land, level. Soil, sandy clay. No timber or undergrowth.</p>	R 19 E	R 20 E	S 25	S 30	S 36	S 31
R 19 E	R 20 E						
S 25	S 30						
S 36	S 31						
	<p>NOTE.— The field notes continue in the regular order and in the same form; the record of 3 miles is omitted.</p>						
	<p>N. $0^{\circ}05'$ W., bet. secs. 19 and 20.</p> <p>Desc. over rocky N slope.</p>						
2.00	<p>Base of slope, bears N. 80° E. and S. 80° W.</p>						
40.00	<p>Point for the $\frac{1}{4}$ sec. cor. of secs. 19 and 20.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 15 N R 20 E</p> <p>$\frac{1}{4}$</p> <table border="1"> <tr> <td>S 19</td><td>S 20</td></tr> </table> <p>1972</p> </div>	S 19	S 20				
S 19	S 20						
44.50	<p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>S. bank of Lins Lake, bears N. 74° W. and East; point for the meander cor. of secs. 19 and 20.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>MC</p> <table border="1"> <tr> <td>S 19</td><td>S 20</td></tr> <tr> <td>T 15 N</td><td>R 20 E</td></tr> </table> <p>1972</p> </div> <p>from which</p> <p>A box elder, 8 ins. diam., bears S. $77\frac{1}{2}^{\circ}$ E., 221 lks. dist., mkd. T15N R20E S20 MC BT.</p>	S 19	S 20	T 15 N	R 20 E		
S 19	S 20						
T 15 N	R 20 E						

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p>A green ash, 10 ins. diam., bears West, 327 lks. dist., mkd. T15N R20E S19 MC BT.</p> <p>Land, gently rolling. Soil, rich loam. Timber, scattering green ash and box elder along lake shore; undergrowth, willow.</p>
	<p>From the cor. of secs. 16, 17, 20, and 21.</p>
	<p>N. $89^{\circ}54'$ W., bet. secs. 17 and 20.</p>
	<p>Desc. gradually over gently rolling land.</p>
20.50	<p>Road, ungraded, 15 lks. wide, bears N and S.</p>
28.70	<p>Ditch, course S. 30° W.; enter cultivated field, edge bears same as ditch.</p>
36.50	<p>Leave field; enter heavy timber, edge bears N. 30° E. and S. 30° W.</p>
40.00	<p>Point for the $\frac{1}{4}$ sec. cor. of secs. 17 and 20.</p>
	<p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>
	<p style="text-align: center;">T 15 N R 20 E</p>
	<p style="text-align: center;">$\frac{1}{4}$ $\frac{S 17}{S 20}$</p>
	<p style="text-align: center;">1972</p>
	<p>from which</p>
	<p>A box elder, 12 ins. diam., bears N. $22\frac{1}{4}^{\circ}$ W., 119 lks. dist., mkd. $\frac{1}{4}$ S17 BT.</p>
	<p>A green ash, 13 ins. diam., bears S. $70\frac{1}{2}^{\circ}$ W., 28 lks. dist., mkd. $\frac{1}{4}$ S20 BT.</p>
43.20	<p>East bank of Lins Lake, bears N. 19° E. and S. $39\frac{3}{4}^{\circ}$ W.; point for the meander cor. of secs. 17 and 20, occupied by a green ash, 8 ins. diam., mkd.</p>
	<p>S17 on N, T15N R20E on E, S20 on S, and MC on W side;</p>
	<p>from which</p>
	<p>A green ash, 10 ins. diam., bears N. $40\frac{3}{4}^{\circ}$ E., 20 lks. dist., mkd. T15N R20E S17 MC BT.</p>
	<p>A box elder, 6 ins. diam., bears S. $62\frac{1}{4}^{\circ}$ E., 114 lks. dist., mkd. T15N R20E S20 MC BT.</p>
	<p>Land, gently rolling. Soil, loam. Timber, mostly green ash and box elder, with some cottonwood; undergrowth, willow.</p>
	<p>NOTE.— The line bet. secs. 8 and 17 is established next by running from the cor. of secs. 8, 9, 16, and 17, N. $89^{\circ}54'$ W., parallel to the S. bdy. of sec. 17, 80.00 chs., with the $\frac{1}{4}$ sec. cor. at 40.00 chs.</p>

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS

The line bet. secs. 17 and 18 is then established by running from the cor. of secs. 7, 8, 17, and 18, S. $0^{\circ}05'$ E., parallel to the E. bdy. of sec. 17, 20.19 chs., to the north bank of Lins Lake.

The line bet. secs. 7 and 18 is established by the random and true line method with closing sec. cors. on the E. and W. bdrs. of the Lake City Townsite, but without a $\frac{1}{4}$ sec. cor. monument, as the point falls within the townsite. The field notes call for a point for the $\frac{1}{4}$ sec. cor. at 40.00 chs. from the east.

The remaining 4 miles of the regular subdivisional lines are established in the normal manner, and at the $\frac{1}{4}$ sec. cor. on the line bet. secs. 5 and 8 the bearing and dist. to the U.S. Location Monument in the SW $\frac{1}{4}$ SE $\frac{1}{4}$ of sec. 5 is determined and recorded.

IVY ISLAND

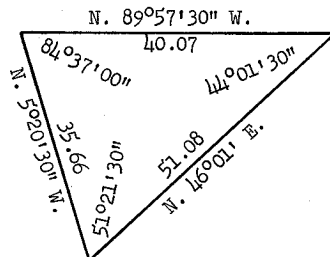
In order to establish the line bet. secs. 18 and 19, which crosses Ivy Island in Lins Lake, a bearing of N. $89^{\circ}54'$ W. was sighted from the meander cor. of secs. 17 and 20, on an extension of the section line, to the SE bank of the island, where a temp. point was established.

From the temp. point on the island the bearing was observed to the meander cor. of secs. 19 and 20, on the south bank of the lake. By calculation it was determined that the temp. point was 80.04 chs. North of the S. bdy. of sec. 19, and the point was moved 4 lks. South.

From the adjusted point the meander cor. of secs. 19 and 20 bears S. $5^{\circ}20'30''$ E., and the meander cor. of secs. 17 and 20 bears S. $89^{\circ}57'30''$ E.

The meanders of the lake in sec. 20, hereinafter described, were reduced to an equivalent direct line between the meander cors. with a bearing of N. $46^{\circ}01'$ E., and a length of 51.08 chs. The equivalent line was used as a base for the triangulation.

The calculated angles of the triangle are shown in the following diagram:



The resulting connections across the lake are N. $89^{\circ}57'30''$ W., 40.07 chs., and N. $5^{\circ}20'30''$ W., 35.66 chs.

The latter course and dist. reduce to a northing of 35.50 chs. and a westing of 3.32 chs.; the allowance for the bearing of the E. bdy. of sec. 19, continued to the theoretical point for the cor. of secs. 17, 18, 19, and 20, in the lake, is 5 lks., making the net westing 3.27 chs.

N. $89^{\circ}58'$ W., bet. secs. 18 and 19.

Over water.

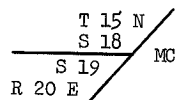
Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS

3.27

The adjusted point for the meander cor. of secs. 18 and 19, on the SE bank of Ivy Island; the bank bears N. $47\frac{1}{4}^{\circ}$ E. and S. $47\frac{1}{4}^{\circ}$ W.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.



1972

from which

A burr oak, 9 ins. diam., bears N. $16\frac{1}{4}^{\circ}$ W., 29 lks. dist., mkd. T15N R20E S18 MC BT.

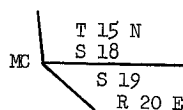
A green ash, 8 ins. diam., bears S. $78\frac{3}{4}^{\circ}$ W., 127 lks. dist., mkd. T15N R20E S19 MC BT.

Thence over level land, across Ivy Island.

7.38

SW bank of the island, bears N. $5\frac{1}{2}^{\circ}$ W. and S. 52° E.; point for the meander cor. of secs. 18 and 19.

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.



1972

Raise a mound of stone, 6 ft. base, 3 ft. high, E of cor.

Land, nearly level, being higher at the north side of the island.

Soil, rich loam and rocky.

Timber, scattering burr oak and green ash; undergrowth, willow.

MEANDERS OF IVY ISLAND

Thence with the meanders of Ivy Island in sec. 18.

Along the top of a well-defined escarpment situated at the upper side of a gravelly beach.

N. $5^{\circ}30'$ W., 2.90 chs.

N. $35^{\circ}00'$ W., 1.60 chs.

S. $45^{\circ}15'$ W., 1.40 chs.

S. $56^{\circ}00'$ W., 2.30 chs.

N. $73^{\circ}30'$ W., 4.50 chs.

N. $38^{\circ}00'$ W., 6.40 chs. On this course the bank increases in height from 3 to 15 ft.; the beach becomes narrow and rocky.

N. $12^{\circ}00'$ E., 4.20 chs.

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

	CHAINS	<p>N. $59^{\circ}15'$ E., 5.30 chs. On this course the bank becomes a nearly vertical cliff, 35 ft. above mean high water.</p> <p>East, 2.60 chs.</p> <p>S. $36^{\circ}00'$ E., 3.80 chs.</p> <p>S. $56^{\circ}15'$ E., 6.40 chs. On this course leave cliff; bank gradually becomes lower to a height of about 4 ft.</p> <p>S. $29^{\circ}00'$ E., 7.00 chs.</p> <p>S. $47^{\circ}15'$ W., 3.40 chs. The meander cor. of secs. 18 and 19.</p> <p>Land, rolling. Soil, loam and rocky. Timber, scattering burr oak and green ash; undergrowth, ivy.</p> <p>Thence in sec. 19.</p> <p>Along the top of a low bank, 1 to 4 ft. high, on the upper side of a gravelly beach.</p> <p>S. $47^{\circ}15'$ W., 2.50 chs.</p> <p>N. $53^{\circ}10'$ W., 2.84 chs. The meander cor. of secs. 18 and 19, and place of beginning.</p> <p>Land, level. Soil, loam and gravelly. Timber, scattering burr oak and green ash; undergrowth, ivy.</p> <p>NOTE.— The detail of the improvements on the island is carried to the general description at the close of the field notes, and to the plat of survey.</p> <p style="text-align: center;">DIAMOND ROCK</p> <p>The survey of a small island called Diamond Rock, in Lins Lake, in sec. 18, was begun at the meander cor. of secs. 19 and 24, on the W. bdy. of the Tp. and the south bank of the lake, monumented with a limestone, 14 x 8 x 8 ins. above ground, firmly set, mkd. MC on N and with 3 grooves on S face, with a mound of stone, 2 ft. base, $1\frac{1}{2}$ ft. high, S of cor.</p> <p>N. $71^{\circ}30'$ E., on a connecting line.</p> <p>Over water.</p> <p>Dist. by triangulation. [Details omitted]</p> <p>21.44 SW bank of Diamond Rock at ordinary high water elevation; point for auxiliary meander cor. in sec. 18</p> <p>Set a brass tablet, $3\frac{3}{4}$ ins. diam., $3\frac{1}{2}$ in. stem, in drill hole in solid rock, with top mkd.</p> <p style="text-align: center;">AMC T 15 N R 20 E S 18 1972</p>
--	--------	---

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p>Raise a mound of stone, 3 ft. base, 2 ft. high, NE of cor.</p> <p>From this point the meander cor. of secs. 13 and 18, on the W. bdy. of the Tp. and on the north bank of the lake, bears N. 25°02' W. The connecting dist., by triangulation, with the crossing dist. on the W. bdy. of the Tp. as the base, is 48.06 chs. The meander cor. is mkd. by a juniper, 14 ins. diam., with healed blazes on N and S sides.</p> <p>Thence with the meanders of the island.</p> <p>Along the top of a low but well-defined bank, on the upper side of a gravelly beach.</p> <p>N. 16°30' W., 2.70 chs.</p> <p>N. 61°15' E., 2.90 chs.</p> <p>S. 48°30' E., 3.50 chs.</p> <p>S. 33°00' W., 2.20 chs.</p> <p>N. 86°46' W., 3.19 chs. The auxiliary meander cor.</p> <p>Land, level. Soil, gravelly loam. No timber or undergrowth.</p>
	<p style="text-align: center;">MEANDERS OF LINS LAKE</p> <p>From the meander cor. of secs. 19 and 24, on the W. bdy. of the Tp. and the south bank of Lins Lake.</p> <p>With the meanders of Lins Lake in sec. 19.</p> <p>Along the edge of a well-defined bank, 2 to 4 ft. high, on the upper side of a gravelly beach.</p> <p>S. 56°00' E., 7.20 chs.</p> <p>S. 46°30' E., 3.40 chs.</p> <p>S. 44°00' E., 2.40 chs.</p> <p>S. 43°15' E., 5.70 chs.</p> <p>S. 45°15' E., 4.40 chs.</p> <p>S. 44°45' E., 5.80 chs.</p> <p>S. 45°30' E., 2.00 chs.</p> <p>S. 49°30' E., 4.00 chs.</p> <p>S. 54°15' E., 5.00 chs.</p> <p>S. 67°45' E., 2.00 chs.</p> <p>S. 78°00' E., 6.67 chs. At end of course.</p> <p style="text-align: right;">Point for the special meander cor. on the meridional center line of sec. 19, 40.00 chs. in westing from the E. bdy. of the sec.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	
	<p>Set an iron post, 28 ins. long, 2½ ins. diam., 2½ ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">SMC</p> <p style="text-align: center;">C S 19 C</p> <p style="text-align: center;">1972</p> <p>Raise a mound of stone, 6 ft. base, 2 ft. high, S of cor.</p> <p>N. 85°30' E., 1.93 chs.</p> <p>N. 77°45' E., 11.00 chs.</p> <p>S. 77°45' E., 7.20 chs.</p> <p>S. 74°00' E., 21.11 chs. The meander cor. of secs. 19 and 20.</p> <p>Land, level. Soil, gravelly loam. Timber, scattering green ash and burr oak; undergrowth, willow.</p>
	<p>Thence in sec. 20.</p> <p>Along the top of a well-defined bank, 2 to 4 ft. high, on the upper side of a gravelly beach; through scattering ash and oak.</p> <p>S. 89°45' E., 6.10 chs.</p> <p>N. 57°00' E., 12.00 chs.</p> <p>N. 37°30' E., 10.50 chs.</p> <p>N. 46°00' E., 5.00 chs.</p> <p>N. 23°15' E., 9.90 chs. On this course enter a belt of heavy timber, parallel to the bank.</p> <p>N. 39°45' E., 10.48 chs. The meander cor. of secs. 17 and 20.</p> <p>Land, level. Soil, gravelly loam. Timber, green ash and burr oak; undergrowth, willow.</p>
	<p>NOTE.— The meanders continue around the north bank of the lake through secs. 17 and 18 in the same form; the record is omitted.</p>
	<p style="text-align: center;">CLEAR LAKE</p> <p>From the ¼ sec. cor. of secs. 28 and 33.</p> <p>S. 0°03' E., on the theoretical bearing of the N. and S. center line of sec. 33.</p> <p>Over level land.</p>

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS 3.50	Creek, 8 lks. wide, course S. 80° E.
24.00	<p>North bank of Clear Lake, bears S. 53° E. and S. 52° W.; point for special meander cor. on the meridional center line of sec. 33.</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div data-bbox="716 388 813 519" data-label="Diagram"> </div> <p>1972</p> <p>Raise a mound of stone, 2 ft. base, 1½ ft. high, N of cor.</p>
	<p>Thence with the meanders of Clear Lake.</p> <p>Along the top of a well-defined bank, 6 to 10 ft. high, through scattering timber.</p> <p>S. 53°00' E., 13.00 chs. At 7.00 chs. leave scattering timber.</p> <p>S. 0°30' W., 7.20 chs. At end of course, the outlet of the lake, 20 lks. wide, course SE.</p> <p>S. 70°00' W., 15.10 chs. Along a belt of heavy timber, parallel to the bank.</p> <p>N. 63°45' W., 10.00 chs. At 7.00 chs. leave timber.</p> <p>N. 13°00' W., 21.00 chs. At end of course, the mouth of a creek, 8 lks. wide.</p> <p>N. 52°00' E., 17.34 chs. At end of course, the special meander cor.</p> <p>Land, level and gently rolling. Soil, loam. Timber, green ash and burr oak; undergrowth, willow.</p>
	<p>MEANDERS OF THE YELLOWSTONE RIVER</p> <p>From the meander cor. of secs. 25 and 30, on the E. bdy. of the Tp. and the right bank of the Yellowstone River, monumented with a sandstone, 16 x 9 x 7 ins. above ground, firmly set, mkd. MC on N and with 2 grooves on S face, with a mound of stone, 2 ft. base, 1½ ft. high, S of cor.</p> <p>Thence upstream with the meanders of the right bank of the river, in sec. 25; over bottom land, along a well-defined cutbank, 2 to 12 ft. high, through heavy timber.</p> <p>S. 85°00' W., 13.00 chs.</p> <p>S. 72°00' W., 7.10 chs.</p> <p>S. 64°30' W., 13.00 chs.</p> <p>S. 40°30' W., 5.40 chs. At end of course, mouth of Cherry Creek, 14 lks. wide.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	<p>S. $77^{\circ}45'$ W., 7.00 chs.</p> <p>N. $76^{\circ}00'$ W., 7.40 chs.</p> <p>S. $80^{\circ}00'$ W., 12.00 chs.</p> <p>S. $81^{\circ}08'$ W., 19.43 chs. The meander cor. of secs. 25 and 26.</p> <p>Land, level bottom; subject to overflow. Soil, alluvial silt and loam. Timber, green ash and cottonwood; undergrowth, willow.</p> <p>NOTE.— The meanders of the right bank are continued upstream in secs. 26 and 35, to the S. bdy. of the Tp. The field notes then show the meanders of the left bank running downstream in secs. 35, 26, and 25, in the same form. The record is omitted.</p> <p>LAKE CITY TOWNSITE</p> <p>An examination on the ground and consultation with the surveyor who was employed by the applicants for the subdivision of the Lake City townsite reveals that a preliminary survey was initiated at the $\frac{1}{4}$ sec. cor. of secs. 7 and 12, on the W. bdy. of the Tp., with the intention of conforming the N. bdy. of the townsite to the E. and W. center line of sec. 7, when officially established. A calculated position for the W. $1/16$ sec. cor. on that line was adopted as the temp. NW cor. of the townsite, and the temp. NE cor. was placed at a point where a line running south would include all contemplated improvements. The temp. E. and W. bdrs. were run south to Lins Lake. This general plan was adhered to.</p> <p>Transit lines, without the use of the solar attachment, are employed in the survey of the boundaries and subdivision of secs. 7 and 18, and in the survey of the E. bdy. of the townsite, the azimuths being referred to a meridian established by Polaris observation.</p> <p>From the $\frac{1}{4}$ sec. cor. of secs. 7 and 18.</p> <p>N. $0^{\circ}05'$ W., on the N. and S. center line of sec. 7.</p> <p>40.00 Point for the center $\frac{1}{4}$ sec. cor. of sec. 7, at intersection with the E. and W. center line.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., in a concrete form, 8 ins. upper diam., 14 ins. lower diam., 30 ins. long, 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">C $\frac{1}{4}$ S 7 LC TS 1972</p> <p>80.04 The $\frac{1}{4}$ sec. cor. of secs. 6 and 7.</p> <p>25.80 From the $\frac{1}{4}$ sec. cor. of secs. 7 and 8.</p> <p>N. $89^{\circ}56'$ W., on the E. and W. center line of sec. 7.</p> <p>Point for the NE cor. of the townsite.</p>
--------	--

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	<p>Set an iron post, 28 ins. long, 2½ ins. diam., in a concrete form, 8 ins. upper diam., 1¼ ins. lower diam., 30 ins. long, 2¼ ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> $\begin{array}{c} \text{C} \quad \text{S} \quad \text{7} \quad \text{C} \\ \text{LC} \quad \quad \text{S7} \\ \text{TS} \quad \end{array}$ <p>1972</p> </div> <p>From this point the temp NE cor. monument bears North, 7 lks. dist., a limestone, 21 x 1¼ x 9 ins., mkd. NE COR LC on one side. The stone is now removed and buried alongside the iron post as a memorial.</p> <p>Continue on the E. and W. center line, along the N. bdy. of the townsite.</p> <p>40.00 The center ¼ sec. cor. of sec. 7.</p> <p>60.00 Point for the center west 1/16 sec. cor. of sec. 7 and NW cor. of the townsite.</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., in a concrete form, 8 ins. upper diam., 1¼ ins. lower diam., 30 ins. long, 2¼ ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> $\begin{array}{c} \text{CW } 1/16 \\ \text{S } 7 \quad \quad \text{LC} \\ \text{TS} \end{array}$ <p>1972</p> </div> <p>From this point the temp. NW cor. monument bears N. 81°45' E., 1¼ lks. dist., an oak post, ¼ ins. sq., ¼ ft. long, mkd. NW COR LC on one side. The post is now removed and reset, inverted, alongside the iron post.</p> <p>Continue on the E. and W. center line of sec. 7.</p> <p>77.885 The ¼ sec. cor. of secs. 7 and 12, on the W. bdy. of the Tp., monumented with a limestone, 12 x 10 x 8 ins. above ground, firmly set, mkd. ¼ on W face, with a mound of stone, 2 ft. base, 1½ ft. high, W of cor.</p> <p>From the NE cor. of the townsite.</p> <p>S. 0°05' E., on the E. bdy. of the townsite.</p> <p>40.00 The closing cor. of secs. 7 and 18.</p> <p>Thence in sec. 18.</p> <p>7.53 North bank of Lins Lake; point for auxiliary meander cor. in sec. 18 and SE cor. of the townsite.</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., in a concrete form, 8 ins. upper diam., 1¼ ins. lower diam., 30 ins. long, 2¼ ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> $\begin{array}{c} \text{LC} \quad \text{T } 15 \text{ N} \\ \text{TS} \quad \text{R } 20 \text{ E} \\ \quad \text{S } 18 \end{array}$ <p>AMC</p> <p>1972</p> </div>
--------	---

MANUAL OF SURVEYING INSTRUCTIONS

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS	<p>From this point the temp. SE cor. monument bears West, 6 lks. dist., a limestone, 18 x 9 x 6 ins., mkd. SE COR LC on one side. The stone is now removed and buried alongside the iron post as a memorial.</p>
40.00	<p>From the center west 1/16 sec. cor. of sec. 7 and NW cor. of the townsite.</p> <p>S. 0°05' E., on the N. and S. center line of the SW$\frac{1}{4}$ of sec. 7, and the W. bdy. of the townsite.</p> <p>The closing cor. of secs. 7 and 18 at the point for the W. 1/16 sec. cor.</p>
29.50	<p>Thence in sec. 18, on the N. and S. center line of the NW$\frac{1}{4}$ and W. bdy. of the townsite.</p> <p>North bank of Lins Lake; point for the special meander cor. on the meridional center line of the NW$\frac{1}{4}$ of sec. 18, and SW cor. of the townsite.</p> <p>Set an iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., in a concrete form, 8 ins. upper diam., 14 ins. lower diam., 30 ins. long, 24 ins. in the ground, with brass cap mkd.</p> <div data-bbox="736 772 859 921" data-label="Diagram"> </div> <p>1972</p> <p>From this point the temp. SW cor. monument bears East, 4 lks. dist., a limestone, 16 x 8 x 6 ins., mkd. SW COR LC on one side. The stone is now removed and buried alongside the iron post as a memorial.</p>
	<p style="text-align: center;">MEMORANDUM</p> <p>The segregation of the mineral claims in secs. 4 and 5 and the computation of the areas of the surrounding fractional lots that are subject to entry as agricultural land are derived by aid of the field notes and plats of the mineral patent surveys, which show the connecting courses and distances to the U.S. Location Monument located in the SW$\frac{1}{4}$SE$\frac{1}{4}$ of sec. 5. The position of the latter monument, with reference to the quarter-section corner on the south boundary of the section, is shown in the record of the subdivisional survey. Ordinarily, the courses and distances along the boundaries of the mineral claims cannot be shown at the scale of the township plat, in addition to the more essential information.</p> <p>The survey of the boundaries of the Rancho San Blas grant was made under the provisions of the public land laws (R.S. 223; Mar. 3, 1925, 43 Stat. 1114; 43 U.S.C. 52), prior to the subdivision of the township.</p> <p>The location of the right-of-way of the Montana and Manitoba Railroad with reference to the subdivisional survey is ascertained by notation of the intersections on the section boundaries, and by aid of the map filed with the application for a right-of-way across public land. The land occupied by the railroad is not segregated from the public lands excepting within a townsite.</p>

Subdivision of T. 15 N., R. 20 E., Principal Meridian, Montana

CHAINS

GENERAL DESCRIPTION

A considerable variety of land and soil are found in T. 15 N., R. 20 E., of the Principal Meridian, Montana. The general elevation of the township ranges from about 4,500 to 4,800 feet above sea level. The summit of the Little Snowy Mountains, which extend into Sections 2 and 3, is about 1,200 feet higher. Most of the northern and northeastern portion of the township is rough and rocky, the central part gently rolling, and the southern part nearly level. The soil of the bottom land along the Yellowstone River is an alluvial silt and loam; much of the soil in the central part of the township is a black loam, but the southwestern part is very sandy. There is one small alkali flat which is located along the line between Sections 23 and 24. There is a heavy stand of cottonwood and green ash along the right bank of the river in Section 25, a heavy grove of burr oak along the line between Sections 1 and 12, and a good growth of yellow pine, burr oak, and fir timber over most of the mountainous region.

The Yellowstone River crosses the southeastern portion of the township; it is a meanderable stream under surveying rules, but there is no navigation on the river, owing principally to the swift current and occasional rapids. A ferry is operated in Section 35. There is some navigation on Lins Lake, which is a deep and permanent body of water; only the upper end of the lake extends into this township. Clear Lake is a permanent body of water, meanderable under the Manual regulations. There is an extensive marsh in Sections 16, 21, and 22, which evidently was the bed of a former shallow lake. The marsh and several springs situated along the line between Sections 9 and 16 drain into Lins Lake. Three good springs in Sections 28 and 32, all of considerable flow, are tributary to Clear Lake.

The most important developments at the present time are the gold-bearing quartz mineral claims in Sections 4 and 5, and the Montana and Manitoba Railroad, which crosses the northwestern part of the township. A limestone quarry in the NW $\frac{1}{4}$ SW $\frac{1}{4}$ of Section 9 may be expanded considerably if there should be a demand for building stone in this vicinity. The proposed Lake City townsite is well chosen and offers many advantages. The applicants for the townsite subdivision are making a bona fide effort to encourage an interest in the area.

There are three settlers in Sections 17 and 20 who have small fields in cultivation, under irrigation; three other settlers, one each in Sections 19, 25, and 35, have made their first improvements, and one of them has about 40 acres in cultivation. At present the predominating interest is in stock grazing on the excellent growth of native grasses over most of the township. The township has an excellent water supply. There are several cottages on Ivy Island, in Lins Lake, which are occupied during the summer months.

Because of site conditions or a lack of available accessories, superior monuments were constructed at several corner point in the township by setting iron posts or brass tablets in concrete cylinders or cones. When available, memorials were deposited, but the soil was not sufficiently firm for pits.

The average of a considerable number of readings over all parts of the township gives a value of 18°10' E. for the mean magnetic declination. There is a range of 20' in local attraction.

MANUAL OF SURVEYING INSTRUCTIONS

FIELD ASSISTANTS

NAMES	CAPACITY
	Surveying Technician
	Survey Aid
	Survey Aid
	Survey Aid
	Survey Aid

CERTIFICATE OF SURVEY

(I) ~~(We)~~, Robert Acres, Cadastral Surveyor, HEREBY
 CERTIFY upon honor that, in pursuance of special instructions bearing date of the 1st day
 of April, 1972, (I) ~~(We)~~ have surveyed the subdivisional and
 meander lines of Township 15 North, Range 20 East,

of the Principal Meridian, in the State of Montana, which
 are represented in the foregoing field notes as having been executed by (me), ~~(us)~~ and under (my)
~~(our)~~ direction; and that said survey has been made in strict conformity with said special instruc-
 tions, the Manual of Instructions for the Survey of the Public Lands of the United States, and in
 specific manner described in the foregoing field notes.

July 31, 1972
 (Date)

/S/ Robert Acres
 (Cadastral Surveyor)

(Date)

(Cadastral Surveyor)

CERTIFICATE OF APPROVAL

BUREAU OF LAND MANAGEMENT
 Washington, D.C.
 September 15, 1972

The foregoing field notes of the survey of the subdivisional and meander lines of
 T. 15 N., R. 20 E., of the Principal Meridian, Montana,

executed by Robert Acres, Cadastral Surveyor,
 having been critically examined and found correct, are hereby approved.

(Date)

(Chief, Division of Cadastral Survey)

SPECIMEN FIELD NOTES, DEPENDENT RESURVEY

The examples illustrate how the resurvey record is coordinated with the original record in the introductory statement and in the body of the field notes. The resurveys are restorations according to the best available evidence, with proportionate distribution of differences in measurement between the original surveys and the resurveys. Several miles of field notes are included to show forms of record and to compare and contrast the style with the specimen field notes of original surveys. The corner descriptions are intended to furnish a variety of examples. One of the examples is the modified record of an actual resurvey in Arkansas, the other an entirely fictitious record of a resurvey in Montana.

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS

The history of surveys of Township 1 South, Range 26 West, Fifth Principal Meridian, Arkansas, is as follows:

The south boundary was surveyed by Rudolph N. Rowland in 1837. The north boundary (Base Line), east boundary, and west boundary were surveyed by John E. Graham in 1838. The township was subdivided by Benjamin F. Owen in 1845. The north boundary was resurveyed by R.W. Livingston in 1929.

The following field notes describe the dependent resurvey of the east, west, and south boundaries and the subdivisional lines of the township.

The survey was executed in accordance with specifications set forth in the Manual of Surveying Instructions, 19__, and the Special Instructions for Group No. __, Arkansas, dated ____.

Preliminary to the resurvey the lines of the original survey were retraced and search was made for all corners and other calls of the record. Identified corners were remonumented in their original positions; lost corners were restored and monumented at proportionate positions based on the original record. The retracement data were thoroughly verified and only the true line field notes are given herein.

The directions of lines were determined by solar instrument methods and by means of fore- and backsights and angular deflections from azimuths obtained by direct solar observations.

The geographic position of the southeast corner of the township, as scaled from the U.S. Geological Survey quadrangle map ____, prepared in ____, is as follows:

Latitude ____ Longitude ____

The mean magnetic declination is ____ E.

Dependent Resurvey of the E. Bdy. of T. 1 S., R. 26 W.,
Fifth Principal Meridian, Arkansas
(Restoring the 1838 survey by John E. Graham)

The cor. of Tps. 1 and 2 S., Rs. 25 and 26 W., is determined at record bearing and distance from the remains of the original bearing trees

A stump hole, bears N. 39° E., 67 lks. dist.

A pine stump, 22 ins. diam., bears S. 59° W., 116 lks. dist., with fragmentary scribe marks visible on opened blaze.

At the corner point

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., in a concrete form, 30 ins. long, 9 ins. diam., 24 ins. in the ground, with brass cap mkd.

Dependent Resurvey of
E. Bdy. of T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	
	<p style="text-align: center;"> T 1 S R 26 W R 25 W <u>S 36 S 31</u> S 1 S 6 T 2 S 1972 </p> <p>from which new bearing trees and a bearing object</p> <p>A pine, 10 ins. diam., bears N. 16° E., 125 lks. dist., mkd. T1S R25W S31 BT.</p> <p>A white oak, 7 ins. diam., bears S. $40\frac{1}{2}^{\circ}$ E., 75 lks. dist., mkd. T2S R25W S6 BT.</p> <p>A white oak, 18 ins. diam., bears S. $53\frac{1}{2}^{\circ}$ W., 94 lks. dist., mkd. T2S R26W S1 BT.</p> <p>A pine, 9 ins. diam., bears N. $44\frac{1}{4}^{\circ}$ W., 35 lks. dist., mkd. T1S R26W S36 BT.</p> <p>A granite boulder, 3 x 2 x 1 ft. above ground, bears N. $20\frac{1}{4}^{\circ}$ W., 40 lks. dist., mkd. X B0 on SE face.</p> <p>Cor. falls in fence extending N and S.</p> <p>N. $0^{\circ}28'$ E., on the E. bdy. of sec. 36, marking and blazing the true line.</p> <p>Asc. 25 ft. over S slope, along fence, through scattering timber and undergrowth.</p> <p>5.00 Top of ascent, slopes W; desc. 70 ft. over N slope.</p> <p>12.20 Draw, drains W; asc. 80 ft. over broken S slope.</p> <p>26.90 Point of spur, slopes N. 70° E.; desc. 70 ft. over broken N slope.</p> <p>39.30 Road, 20 lks. wide, bears E and W; leave fence S of road; fence turns to east.</p> <p>39.79 Point for the $\frac{1}{4}$ sec. cor. of sec. 36 only, at propor- tionate dist.; there is no remaining evidence of the original cor.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;"> T 1 S $\frac{1}{4}$ S 36 R 26 W 1972 </p> <p>from which</p> <p>A white oak, 5 ins. diam., bears N. $2\frac{3}{4}^{\circ}$ W., 22 lks. dist., mkd. $\frac{1}{4}$ S36 BT.</p> <p>A pine, 14 ins. diam., bears S. $14\frac{3}{4}^{\circ}$ W., 130 lks. dist., mkd. $\frac{1}{4}$ S36 BT</p> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>40.60 Creek, 2 lks. wide, course SE; asc. 45 ft. over S slope.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of
E. Bdy. of T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	
47.00	Top of ascent; thence along E slope.
51.40	SE cor. of vacant farmhouse, 40 x 20 ft., bears West, 1.62 chs. dist.; long side bears N and S.
59.85	State Highway No. 270, 40 lks. wide, bears N. $47\frac{1}{2}^{\circ}$ W. and S. $47\frac{1}{2}^{\circ}$ E.
63.00	Desc. 60 ft. over N slope.
79.58	Point for the cor. of secs. 25 and 36 only, monumented by the orig. cor. tree, 12 ins. diam., with faint scribe mks. T1 R26 S25 visible on open blaze on NW and illegible scribe mks. visible on open blaze on SW side, from which the remains of original bearing trees An elm stump, 18 ins. diam., bears S. 28° W., 53 lks. dist.; the fallen trunk alongside has a healed blaze. (Record bearing S. 26° W.) A post oak stump, 24 ins. diam., bears N. 78° W., 65 lks. dist., with no marks visible. And new bearing trees A white oak, 20 ins. diam., bears S. $22\frac{1}{2}^{\circ}$ W., 340 lks. dist., mkd. T1S R26W S36 BT. An elm, 15 ins. diam., bears N. $7\frac{1}{4}^{\circ}$ W., 103 lks. dist., mkd. T1S R26W S25 BT. Land, rolling hills. Soil, rocky clay. Timber, pine, oak, hickory, and elm; undergrowth, young timber.
	N. $1^{\circ}22'$ E., on the E. bdy. of sec. 25. Over gently rolling land, in creek bottom, through scattering timber and undergrowth.
0.25	Hackberry Creek, 30 lks. wide, course N. 80° E.; asc. 40 ft. over S slope.
19.20	Top of ascent; thence over level land.
27.70	Desc. 20 ft. over NW slope.
29.50	Creek, 10 lks. wide, course SW; asc. 20 ft. over S slope.
40.09	The $\frac{1}{4}$ sec. cor. of sec. 25 only, determined from the remains of the original bearing trees A stump hole, bears N. 62° W., 63 lks. dist., with an uprooted pine alongside, 14 ins. diam., with healed blaze. (Record bearing N. 58° W.) A stump hole, bears S. 45° W., 27 lks. dist. (Record bearing S. 35° W.) At the corner point Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.

Dependent Resurvey of
E. Bdy. of T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	<div style="text-align: center;"><table><tr><td>T 1 S</td></tr><tr><td>$\frac{1}{4}$ S 25</td></tr><tr><td>R 26 W</td></tr></table><p>1972</p></div> <p>from which new bearing trees</p> <p>A pine, 10 ins. diam., bears N. 48° W., 49 lks. dist., mkd. $\frac{1}{4}$ S25 BT.</p> <p>A pine, 5 ins. diam., bears S. $21\frac{1}{4}^{\circ}$ W., 39 lks. dist., mkd. $\frac{1}{4}$ S25 BT.</p> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>From this cor. a local monument, a pine knot, 4 ins. diam., 12 ins. above ground, in a mound of stone, 2 ft. base, 1 ft. high, bears S. $78\frac{3}{4}^{\circ}$ E., 28 lks. dist.</p> <hr/> <p>N. $1^{\circ}00'$ E., beginning new measurement.</p> <p>Asc. 55 ft. over SW slope.</p> <p>16.00 Top of ascent; thence over rolling W and NW slopes, descending 10 ft. to cor.</p> <p>20.50 Draw, drains NW.</p> <p>25.40 Creek, 5 lks. wide, course SW.; asc. slightly.</p> <p>40.68 Point for the cor. of secs. 24 and 25 only, at proportionate distance; there is no remaining evidence of the original cor.</p> <p>Set a brass tablet, $3\frac{1}{4}$ ins. diam., $3\frac{1}{2}$-in. stem, in a concrete form, 6 ins. diam., 30 ins. long, 24 ins. in the ground, with top mkd.</p> <div style="text-align: center;"><table><tr><td>T 1 S</td><td>T 1 S</td></tr><tr><td>S 24</td><td></td></tr><tr><td>S 25</td><td></td></tr><tr><td>R 26 W</td><td>R 25 W</td></tr></table><p>1972</p></div> <p>from which</p> <p>A pine, 8 ins. diam., bears S. $49\frac{3}{4}^{\circ}$ W., 44 lks. dist., mkd. T1S R26W S25 BT.</p> <p>A pine, 12 ins. diam., bears N. $60\frac{3}{4}^{\circ}$ W., 49 lks. dist., mkd. T1S R26W S24 BT.</p> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, W of cor.</p> <p>Land, rolling hills. Soil, rocky clay. Timber, pine, oak, elm, hickory, and gum; undergrowth, young timber and dogwood.</p> <p>NOTE.— Remainder of east boundary of the township is omitted.</p>	T 1 S	$\frac{1}{4}$ S 25	R 26 W	T 1 S	T 1 S	S 24		S 25		R 26 W	R 25 W
T 1 S												
$\frac{1}{4}$ S 25												
R 26 W												
T 1 S	T 1 S											
S 24												
S 25												
R 26 W	R 25 W											

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of the S. Bdy. of T. 1 S., R. 26 W.,
Fifth Principal Meridian, Arkansas

CHAINS	(Restoring the 1837 survey by Rudolph N. Rowland)
	<p>From the cor. of Tps. 1 and 2 S., Rs. 25 and 26 W., heretofore described.</p> <p>S. 88°51' W., on the S. bdy. of sec. 36, marking and blazing the true line.</p> <p>Over rolling land, through scattering timber and undergrowth.</p>
1.40	Desc. 70 ft. over W. slope.
7.50	Enter river bottom, edge bears N and S.
19.20	Left bank of Ouachita River, course S. 15° E.
24.80	Right bank of river; thence over gently rolling land, through timber and undergrowth.
40.325	<p>Point for the $\frac{1}{4}$ sec. cor. of sec. 36 only, at proportionate dist.; there is no remaining evidence of the original cor.</p> <p>Set an iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 1 S R 26 W</p> <p><u>$\frac{1}{4}$ S 36</u></p> <p>1972</p> </div> <p>from which</p> <p>A post oak, 10 ins. diam., bears N. 60$\frac{1}{4}$° E., 75 lks. dist., mkd. $\frac{1}{4}$ S36 BT.</p> <p>A pine, 7 ins. diam., bears N. 73$\frac{1}{2}$° W., 16 lks. dist., mkd. $\frac{1}{4}$ S36 BT.</p>
73.00	Enter end of a lane extending W along line.
74.55	Creek, 2 lks. wide, course NW; asc. slightly.
79.60	Lane turns S; thence along old fence.
80.65	<p>Point for the cor. of secs. 35 and 36 only, determined longitudinally by proportionate measurement and latitudinally by an old fence bearing E and W. There is no remaining evidence of the original monument.</p> <p>Set an iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 1 S R 26 W</p> <p><u>S 35 S 36</u></p> <p>1972</p> </div> <p>from which</p> <p>A cedar, 4 ins. diam., bears N. 85$\frac{1}{2}$° E., 91 lks. dist., mkd. T1S R26W S36 BT.</p> <p>A pine, 4 ins. diam., bears N. 30° W., 356 lks. dist., mkd. T1S R26W S35 BT.</p>

Dependent Resurvey of
S. Bdy. of T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	<p>Land, gently rolling. Soil, rocky and sandy clay. Timber, pine, oak, hickory, cedar, and gum; undergrowth, young timber.</p>
	<p>S. 89°55' W., on the S. bdy. of sec. 35. Desc. slightly over gently rolling land, between fields.</p>
4.70	<p>Enter timber and undergrowth, edge bears NE and S. 80° W.; desc. 30 ft.</p>
14.00	<p>Creek, 15 lks. wide, course NE.</p>
17.00	<p>Edge of bottom, bears NE and SW; asc. 110 ft. over SE slope.</p>
31.10	<p>Ridge, bears NE and SW; desc. 65 ft. over NW slope.</p>
40.32	<p>The $\frac{1}{4}$ sec. cor. of sec. 35 only, perpetuated with an un- mkd. pine stake, 2 ft. long, 2 ins. sq., set in a mound of stone, 3 ft. base, $1\frac{1}{2}$ ft. high, at cor. of fences ex- tending E and N, from which a large pine stump hole bears N. 33$\frac{1}{2}$° W., 15 lks. dist., agreeing with the record posi- tion of an original pine bearing tree.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">T 1 S R 26 W <u>$\frac{1}{4}$ S 35</u> 1972</p> <p>from which new bearing trees</p> <p style="padding-left: 40px;">A red oak, 13 ins. diam., bears N. 69° E., 25 lks. dist., mkd. $\frac{1}{4}$ S35 BT.</p> <p style="padding-left: 40px;">A post oak, 13 ins. diam., bears N. 7$\frac{1}{2}$° W., 31 lks. dist., mkd. $\frac{1}{4}$ S35 BT.</p> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, N of cor. Reset the pine stake, inverted, alongside the iron post.</p>
	<p>S. 89°37' W., beginning new measurement. Over gently rolling land.</p>
18.50	<p>Fence, bears N and S; thence along old fence row.</p>
38.45	<p>Creek, 3 lks. wide, course N. 30° E.; enter timber, edge bears N. 30° E. and S.</p>
40.16	<p>The cor. of secs. 34 and 35 only, monumented with an un- mkd. wooden stake, 2 ins. sq., projecting 12 ins. above ground at cor. of fences extending N, E, and W. This position is harmoniously related to existing original cors., has long been recognized as the cor. by adjacent landowners, and is accepted as the best available evidence of the original corner position.</p> <p>At the corner point</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of
S. Bdy. of T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS					
	<p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, and in a flat mound of stone to top, 5 ft. diam., with brass cap mkd.</p> <div style="text-align: center;"> <table border="1"> <tr> <td>T 1 S</td> <td>R 26 W</td> </tr> <tr> <td>S 34</td> <td>S 35</td> </tr> </table> <p>1972</p> </div> <p>from which</p> <p>A water oak, 6 ins. diam., bears N. $53\frac{1}{2}^{\circ}$ E., 79 lks. dist., mkd. TLS R26W S35 BT.</p> <p>A water oak, 7 ins. diam., bears N. $75\frac{1}{2}^{\circ}$ W., 22 lks. dist., mkd. TLS R26W S34 BT.</p> <p>Reset the wooden stake, inverted, alongside the iron post.</p> <p>Land, gently rolling. Soil, rocky clay. Timber, pine, oak, hickory, and gum; undergrowth, young timber, vines, and briars.</p> <p>NOTE.— Remainder of south boundary and all of west boundary of township is omitted.</p> <p>Dependent Resurvey of the Subdivisional Lines, T. 1 S., R. 26 W., Fifth Principal Meridian, Arkansas (Restoring the 1845 survey by B. F. Owen)</p> <p>From the cor. of secs. 35 and 36, on the S. bdy. of the Tp., heretofore described.</p> <p>N. $0^{\circ}26'$ E., bet. secs. 35 and 36, marking and blazing the true line.</p> <p>Desc. 45 ft. over N slope, through field.</p> <p>11.15 Right bank of channel of the Ouachita River, 135 lks. wide, course E.</p> <p>12.50 Left bank of first channel; thence over island.</p> <p>14.60 Right bank of second channel, 120 lks. wide, course E.</p> <p>15.80 Left bank of second channel; asc. 85 ft. over S slope.</p> <p>33.45 Farm road, 25 lks. wide, bears E and W.</p> <p>40.08 The $\frac{1}{4}$ sec. cor. of secs. 35 and 36, monumented with a sandstone, 16 x 12 x 12 ins., mkd. $\frac{1}{4}$ on W face, firmly set 10 ins. in the ground, from which the remains of the original bearing trees</p> <p>A dim stump hole, bears S. 73° E., 19 lks. dist.</p> <p>A dim stump hole, bears N. 64° W., 9 lks. dist.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p>	T 1 S	R 26 W	S 34	S 35
T 1 S	R 26 W				
S 34	S 35				

Dependent Resurvey of Subdivisional Lines,
T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	
	<p style="text-align: center;">T 1 S R 26 W</p> <p style="text-align: center;"> $\frac{1}{4}$ S 35 S 36 1972 </p> <p>from which new bearing trees</p> <p>A white oak, 9 ins. diam., bears N. $72\frac{1}{2}^{\circ}$ E., 50 lks. dist., mkd. $\frac{1}{4}$ S36 BT.</p> <p>A white oak, 15 ins. diam., bears N. 59° W., 36 lks. dist., mkd. $\frac{1}{4}$ S35 BT.</p> <p>Deposit the mkd. stone alongside the iron post.</p> <hr style="width: 20%; margin: 10px auto;"/> <p>N. $0^{\circ}44'$ E., beginning new measurement.</p> <p>Over gently rolling land.</p> <p>17.00 Desc. 60 ft. over N slope.</p> <p>28.10 Creek, 3 lks. wide, course NE; thence over level land.</p> <p>29.10 Fence, bears E and W; asc. 30 ft. over S slope.</p> <p>39.00 Top of ascent, slopes E; desc. 5 ft. over N slope.</p> <p>40.26 The cor. of secs. 25, 26, 35, and 36, monumented with an iron bar, 12 x 1 x $\frac{1}{2}$ ins., firmly driven 10 ins. in the ground. This position is harmoniously related to exist- ing original cors., has long been recognized as the cor. by adjacent landowners, and is accepted as the best available evidence of the original cor. position.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;"> T 1 S R 26 W S 26 S 25 S 35 S 36 1972 </p> <p>from which</p> <p>A cedar, 14 ins. diam., bears N. 80° E., 134 lks. dist., mkd. TLS R26W S25 BT.</p> <p>A red oak, 17 ins. diam., bears S. $44\frac{1}{2}^{\circ}$ E., 71 lks. dist., mkd. TLS R26W S36 BT.</p> <p>A white oak, 14 ins. diam., bears S. 61° W., 37 lks. dist., mkd. TLS R26W S35 BT.</p> <p>A white oak, 14 ins. diam., bears N. $3\frac{1}{4}^{\circ}$ W., 67 lks. dist., mkd. TLS R26W S26 BT.</p> <p>NW cor. of pasture fence bears S. 46° E., 11 lks. dist.</p> <p>Reset iron bar at S side of iron post.</p> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, W of cor.</p> <p>Land, rolling hills.</p> <p>Soil, rocky clay.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of Subdivisional Lines,
T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	Timber, pine, oak, hickory, maple, elm, gum, sycamore, and cedar; undergrowth, young timber.
	<p>From the cor. of secs. 25 and 36, on the E. bdy. of the Tp., heretofore described.</p> <p>S. 89°12' W., bet. secs. 25 and 36.</p> <p>Asc. 65 ft. over rolling NW slope, through field.</p>
16.95	State Highway No. 270, 40 lks. wide, bears N. 48½° W. and S. 48½° E.; leave field and enter timber and undergrowth; edge bears NE and SW.
37.50	Spur, slopes SW; desc. 20 ft. over W slope.
40.23	<p>The ¼ sec. cor. of secs. 25 and 36, perpetuated by persons unknown with an unmkd. granite stone, 18 x 8 x 7 ins., firmly set 12 ins. in the ground, alongside NE cor. of a fence. This position is harmoniously related to existing original cors., has long been recognized as the cor. by adjacent landowners, and is accepted as the best available evidence of the original cor. position.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 1 S R 26 W</p> <p>¼ S 25</p> <p>S 36</p> </div> <p>1972</p> <p>from which</p> <p>A post oak, 8 ins. diam., bears N. 3° E., 49 lks. dist., mkd. ¼ S25 BT.</p> <p>An elm, 6 ins. diam., bears S. 53½° E., 32 lks. dist., mkd. ¼ S36 BT.</p> <p>Deposit the unmkd. stone alongside the iron post.</p> <p>S. 89°26' W., beginning new measurement.</p> <p>Asc. 20 ft. over E slope, through scattering timber and undergrowth.</p>
1.95	NE cor. of a house, 40 x 30 ft., bears South, 0.28 chs. dist.; long side bears E and W.
5.20	Top of ascent; thence over rolling land, descending 40 ft.; line follows near secondary road, winding W.
29.70	Creek, 15 lks. wide, course S. 10° E.; asc. 30 ft. over E slope.
38.00	Top of ascent; desc. 10 ft. over NW slope.
40.09	<p>The cor. of secs. 25, 26, 35, and 36.</p> <p>Land, rolling hills.</p> <p>Soil, rocky clay.</p> <p>Timber, pine, oak, hickory, and elm; undergrowth, young timber.</p>

Dependent Resurvey of Subdivisional Lines,
T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	<p>N. 0°46' E., bet. secs. 25 and 26.</p> <p>Over gently rolling land.</p> <p>0.25 Secondary road, 25 lks. wide, winding E and W.</p> <p>0.90 Thence along a fence line, with hedgerow; old clearings E and W.</p> <p>27.50 Creek, course winding S. 20° E.; enter cleared land.</p> <p>40.57 Point for the $\frac{1}{4}$ sec. cor. of secs. 25 and 26, falls in State Highway No. 88, 40 lks. wide, bearing N. 89° E. and S. 89° W. This position is harmoniously related to existing original cor., has long been recognized as the cor. by local residents with knowledge prior to construction of the highway, and is accepted as the best available evidence of the original cor. position.</p> <p>At the corner point</p> <p>Deposit a washed sandstone, 9 x 8 x 6 ins., mkd. X, 14 ins. below surface of highway, from which</p> <p style="padding-left: 40px;">An iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears S. 48° E., 73 lks. dist., with brass cap mkd. $\frac{1}{4}$ S25 RM 1972 73 LKS and an arrow pointing to the cor.</p> <p style="padding-left: 40px;">An iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears N. 48° W., 73 lks. dist., with brass cap mkd. $\frac{1}{4}$ S26 RM 1972 73 LKS and an arrow pointing to the cor.</p> <hr style="width: 20%; margin-left: 40px;"/> <p>N. 0°58' E., beginning new measurement.</p> <p>Asc. 35 ft. over SW slope.</p> <p>6.00 Top of ascent; thence over gently rolling land.</p> <p>19.05 Intersection of roads, bearing N. 74° E., S. 62° W., and North along the sec. line.</p> <p>34.37 State Highway No. 270, 40 lks. wide, bears N. 33°22' W. and S. 33°22' E.</p> <p>40.10 Point for the cor. of secs. 23, 24, 25, and 26, falls at the center line of a gravel road, 25 lks. wide, bearing North and South, and in line with property line fences to the east and west. Mr. Charley Ballentine, a resident of the area for many years, furnished a signed statement, attached to and made a part of these field notes, attesting to the cor. position.</p> <p>At the corner point</p> <p>Deposit a granite stone, 10 x 9 x 6 ins., mkd. X, 19 ins. below surface of road, from which</p> <p style="padding-left: 40px;">A granite boulder, 9 x 6 x 4 ft. above ground, bears N. 34°26' E., 63$\frac{1}{2}$ lks. dist. to a cross chiseled 6 ins. above ground near SW cor., mkd. B + O.</p> <p style="padding-left: 40px;">An elm, 7 ins. diam., bears S. 56 3/4° E., 62 lks. dist., mkd. T1S R26W S25 BT.</p>
--------	--

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of Subdivisional Lines,
T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	
	<p>A pine, 4 ins. diam., bears S. $51\frac{1}{2}^{\circ}$ W., 404 lks. dist., mkd. T1S R26W S26 BT.</p> <p>A mulberry, 4 ins. diam., bears N. 62° W., 203 lks. dist., mkd. T1S R26W S23 BT.</p> <p>Land, gently rolling hills. Soil, rocky clay. Timber, scattering pine, oak, hickory, and elm; under- growth, young timber.</p>
	<p>From the cor. of secs. 24 and 25, on the E. bdy. of the Tp., heretofore described.</p> <p>S. $89^{\circ}33'$ W., bet. secs. 24 and 25.</p> <p>Over gently rolling upland, through scattering timber and undergrowth.</p>
23.20	Draw, drains S.
25.30	Ridge, bears N and S. 20° E.; desc. 70 ft. over W slope.
40.27	<p>The $\frac{1}{4}$ sec. cor. of secs. 24 and 25, monumented with a rough-surfaced conglomerate boulder, 4 x 4 x 2 ft. above ground, mkd. with a large X chiseled on SW face, from which an original bearing tree</p> <p>A sawed post oak stump, 20 ins. diam., bears N. 52° E., 16 lks. dist., with no marks visible.</p> <p>Add the marks $\frac{1}{4}$ at W side of the X, from which new bearing trees</p> <p>A pine, 6 ins. diam., bears N. $40\frac{1}{2}^{\circ}$ E., 130 lks. dist., mkd. $\frac{1}{4}$ S24 BT.</p> <p>A post oak, 6 ins. diam., bears S. $70\frac{1}{2}^{\circ}$ E., 139 lks. dist., mkd. $\frac{1}{4}$ S25 BT.</p> <p>Raise a mound of stone, 4 ft. base, 2 ft. high, N of cor.</p> <p>S. $88^{\circ}44'$ W., beginning new measurement.</p> <p>Over gently rolling land, through scattering timber and undergrowth.</p>
2.10	SE cor. of a house, 30 x 20 ft., bears North, 1.00 ch. dist.; long side bears N and S.
4.70	Enter road, 25 lks. wide, curving from N to W.
11.12	Bridge over Hackberry Creek, 48 lks. wide, course S.
13.70	Leave road, curving SW from E; enter field, edge bears N and S.
40.47	<p>The cor. of secs. 23, 24, 25, and 26.</p> <p>Land, rolling and gently rolling hills. Soil, rocky clay. Timber, pine, oak, and hickory; undergrowth, young timber and dogwood.</p>

Dependent Resurvey of Subdivisional Lines,
T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS

NOTE.— On each mile of the north boundary of the township, which is the base line of the Fifth Principal Meridian, and on each mile of the west boundary, new quarter-section corners of minimum control for the sections of T. 1 S., R. 26 W., are established. The positions are determined by proportionate measurement as based on the original plat. The descriptive statements are given for two corners.

The point for the $\frac{1}{4}$ sec. cor. of sec. 4 only, on the N. bdy. of the Tp., at proportionate dist., based on the original plat, falls in a graded road, 25 lks. wide, bearing N. $89^{\circ}08'$ W. and S. $89^{\circ}08'$ E.

At the corner point

Deposit a sandstone, 14 x 10 x 6 ins., mkd. X, 12 ins. below surface of road, from which

An iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears North, 40 lks. dist., with brass cap mkd. RM 1972 40 LKS and an arrow pointing to the cor.

An iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears South, 40 lks. dist., with brass cap mkd. $\frac{1}{4}$ S4 RM 1972 40 LKS and an arrow pointing to the cor.

From this point the stan. cor. of secs. 32 and 33, T. 1 N., R. 26 W., bears S. $89^{\circ}06'$ E., 1.29 chs. dist., monumented with an iron post, 2 ins. diam., firmly set, projecting 4 ins. above ground, with brass cap properly mkd., from which

A pine, 10 ins. diam., bears N. 30° E., 45 lks. dist., with healed blaze.

A mulberry, 12 ins. diam., bears N. 45° W., 50 lks. dist., with healed blaze.

The point for the $\frac{1}{4}$ sec. cor. of sec. 31 only, on the W. bdy. of the Tp., is at midpoint on the W. bdy. of sec. 31.

At the corner point

Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.

T 1 S
 $\frac{1}{4}$ S 31
R 26 W

1972

from which

A pine, 5 ins. diam., bears N. $37\frac{1}{2}^{\circ}$ E., 41 lks. dist., mkd. $\frac{1}{4}$ S31 BT.

A post oak, 9 ins. diam., bears S. $31\frac{1}{4}^{\circ}$ E., 7 lks. dist., mkd. $\frac{1}{4}$ S31 BT.

From this point the $\frac{1}{4}$ sec. cor. of sec. 36, T. 1 S., R. 27 W., bears S. $0^{\circ}35'$ W., 0.36 chs. dist., heretofore described.

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey,
T. 1 S., R. 26 W., 5th Prin. Mer., Arkansas

CHAINS	<p>NOTE.— The general description for the resurvey follows the same pattern as that in the specimen field notes of the original survey.</p>
	<p>NOTE.— Affidavits to be attached to field notes should be typed on regular field note paper in triplicate, with additional copy made for the person giving testimony.</p>
	<p style="text-align: center;">AFFIDAVIT</p> <p>To whom it may concern: I, Charley Ballentine, do hereby state that I am a lifetime resident in the area adjacent to the corner of sections 23, 24, 25, and 26, T. 1 S., R. 26 W., 5th Principal Meridian, Arkansas, and that I have had definite knowledge of the location of this corner for more than 40 years.</p> <p style="text-align: right;">(Signature) _____</p> <p style="text-align: right;">(Date) _____</p>

SPECIMEN
FIELD NOTES
OF THE
DEPENDENT RESURVEY OF
THE TENTH STANDARD PARALLEL SOUTH
ON THE SOUTH BOUNDARY OF TOWNSHIP 40 SOUTH, RANGE 100 WEST,
AND
THE EAST BOUNDARY AND SUBDIVISIONAL LINES OF
TOWNSHIP 41 SOUTH, RANGE 100 WEST
Of the PRINCIPAL Meridian
In the State of MONTANA

EXECUTED BY

John Smith, Cadastral Surveyor

Under special instructions dated March 17, 1972, which provided for the surveys included under Group Number 500, approved March 18, 1972, and assignment instructions dated March 20, 1972.

Survey commenced April 1, 1972

Survey completed May 15, 1972

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey of T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	<p>The following field notes describe the dependent resurvey of the north boundary, west boundary, and subdivisional lines of Township 41 South, Range 100 West, Principal Meridian, Montana.</p> <p>The north boundary (Tenth Standard Parallel South) was surveyed by William A. Smith in 1876. The south, east, and west boundaries, and the subdivisional lines were surveyed by Paul D. Bryson in 1876. The east boundary was dependently resurveyed by Floyd A. White in 1957. The south boundary was dependently resurveyed by Albert L. Green in 1962. The corner of sections 21, 22, 27, and 28 was remonumented by Albert L. Green in 1965.</p> <p>The resurvey was executed in accordance with the specifications set forth in the Manual of Surveying Instructions, 19__, and the Special Instructions for Group No. 500, Montana, dated March 17, 1972.</p> <p>Preliminary to the resurvey the lines of the original resurvey were retraced and search was made for all corners and other calls of the record. Identified corners were remonumented in their original positions; lost corners were restored and monumented at proportionate positions based on the original record. The retracement data were thoroughly verified and only the true line field notes are given herein.</p> <p>The directions of lines were determined by the solar transit method, checked by direct solar observations.</p> <p>The geographic position of the southeast corner of the township, as scaled from the Geological Survey quadrangle map, "LOOKOUT, MONT.," prepared in 1964, is as follows:</p> <p style="text-align: center;">Latitude 44° 35.7' N. Longitude 110° 15.3' W.</p> <p>The mean magnetic declination is 17° 00' E.</p> <p style="text-align: center;">Dependent Resurvey of the Tenth Standard Parallel South, on the South Boundary of T. 40 S., R. 100 W., Principal Meridian, Montana</p> <p>(Restoring the survey executed by William A. Smith in 1876)</p> <p>Beginning at the stan. cor. of Tps. 40 S., Rs. 99 and 100 W., monumented with a limestone, 26 x 12 x 8 ins., firmly set 12 ins. in the ground, mkd. SC 40S on N, 99W on E, and 100W on W face, from which the remains of the original bearing trees</p> <p style="padding-left: 40px;">A stump hole, bears N. 43° E., 54 lks. dist.</p> <p style="padding-left: 40px;">A pine stump, 20 ins. diam., bears N. 21° W., 115 lks. dist., with healed blaze.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> SC T 40 S R 100 W R 99 W S 36 S 31 </div> <p style="text-align: center;">1972</p>
--------	---

Dependent Resurvey, 10th Stan. Par. S.,
S. Bdy., T. 40 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	<p>from which new bearing trees</p> <p>A pine, 10 ins. diam., bears N. 35° E., 62 lks. dist., mkd. T40S R99W S31 SC BT.</p> <p>A white oak, 14 ins. diam., bears N. $65\frac{1}{2}^{\circ}$ W., 116 lks. dist., mkd. T40S R100W S36 SC BT.</p> <p>Deposit the mkd. stone alongside the iron post.</p> <p>Cor. is located near bottom of SE slope, about 3 chs. NW of a small creek, course SW.</p> <p>From this point the closing cor. of Tps. 41 S., Rs. 99 and 100 W., bears S. $89^{\circ}54'$ E., 5.63 chs. dist., monu- mented with an iron post, $2\frac{1}{2}$ ins. diam., firmly set, pro- jecting 6 ins. above ground, with brass cap mkd. as de- scribed in the official record of the 1957 resurvey of the W. bdy. of T. 41 S., R. 99 W., from which the 1957 bearing trees</p> <p>A pine, 12 ins. diam., bears S. 44° E., 75 lks. dist., mkd. T41S R99W S6 CC BT on unhealed blaze. (Record bearing, S. 45° E.)</p> <p>A pine, 10 ins. diam., bears S. $57\frac{3}{4}^{\circ}$ W., 29 lks. dist., with marks 100W S1 visible on partly healed blaze.</p> <p>Add the marks 1972 on the brass cap.</p> <p>N. $89^{\circ}57'$ W., on the S. bdy. of sec. 36, marking and blazing the true line.</p> <p>Asc. over SE slope, through scattering timber and light undergrowth.</p> <p>6.00 Top of ascent; thence over rolling land.</p> <p>7.50 Fence, barbed wire, bears N. 58° W. and S. 58° E.; enter old logged area, edge bears same as fence; desc. SW slope.</p> <p>12.20 Creek, 5 lks. wide, course S. 25° W.; asc. over SE slope.</p> <p>25.80 Top of ascent; desc. over gradual W slope.</p> <p>34.75 The $\frac{1}{4}$ sec. cor. of sec. 1 only, T. 41 S., R. 100 W., here- inafter described in the field notes of the dependent re- survey of the subdivisional lines of T. 41 S., R. 100 W.</p> <p>35.60 Road, asphalt, 25 lks. wide, bears N. 55° E. and S. 55° W.; enter scattering timber, edge bears same as road.</p> <p>40.10 Point for the stan. $\frac{1}{4}$ sec. cor. of sec. 36, at proportion- ate dist.; there is no remaining evidence of the original cor.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 6 ins. in the ground to bedrock, encircled by a mound of stone, 5 ft. base, to top of brass cap, mkd.</p> <p style="text-align: center;">SC T 40 S R 100 W <u>$\frac{1}{4}$ S 36</u> 1972</p> <p>from which</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, 10th Stan. Par. S.,
S. Bdy., T. 40 S., R. 100 W., Prin. Mer., Montana

CHAINS					
	<p>A hemlock, 16 ins. diam., bears N. $67\frac{3}{4}^{\circ}$ E., 89 lks. dist., mkd. $\frac{1}{4}$ S36 SC BT.</p> <p>A pine, 10 ins. diam., bears N. $22\frac{1}{2}^{\circ}$ W., 15 lks. dist., mkd. $\frac{1}{4}$ S36 SC BT.</p> <p>Ascend slightly.</p> <p>50.10 Spur, slopes S; desc. over SW slope.</p> <p>60.20 Draw, drains S; asc. over broken SE slope.</p> <p>75.13 Point for the closing cor. of secs. 1 and 2, T. 41 S., R. 100 W., hereinafter described in the field notes of the dependent resurvey of the subdivisional lines of T. 41 S., R. 100 W.</p> <p>75.70 Road, unimproved, 15 lks. wide, bears NE and SW.</p> <p>80.20 Point for the stan. cor. of secs. 35 and 36, at propor- tionate dist.; there is no remaining evidence of the original cor.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>SC</p> <table border="1"> <tr> <td>T 40 S</td> <td>R 100 W</td> </tr> <tr> <td>S 35</td> <td>S 36</td> </tr> </table> <p>1972</p> </div> <p>from which</p> <p>A hemlock, 14 ins. diam., bears N. $33\frac{1}{2}^{\circ}$ E., 116 lks. dist., mkd. T40S R100W S36 SC BT.</p> <p>A flat limestone boulder, 6 x 4 ft., projecting 2 ft. above ground, bears N. $50\frac{3}{4}^{\circ}$ W., 85 lks. dist., mkd. X BO at top center.</p> <p>Cor. is located on crest of low ridge bearing NE and SW.</p> <hr/> <p>N. $89^{\circ}57'$ W., on the S. bdy. of sec. 35.</p> <p>Desc. over NW slope through heavy young timber.</p> <p>5.50 Enter heavy old-growth timber, edge bears NE and SW.</p> <p>12.70 NE cor. of log cabin, 20 x 15 ft., bears South, $22\frac{1}{2}$ lks. dist.; long side bears E and W.</p> <p>20.10 Lucky Creek, 20 lks. wide, course N. 30° E.; asc. over broken E slope.</p> <p>30.40 Top of ascent; thence over nearly level land through dense undergrowth.</p> <p>31.20 East bank of small lake, bears N. 30° E. and S. 15° W.</p> <p>35.03 True point for the $\frac{1}{4}$ sec. cor. of sec. 2 only, T. 41 S., R. 100 W., falls in lake where it is impracticable to establish a permanent monument.</p> <p>35.10 West bank of lake, bears N. 45° E. and S. 40° W.; asc. over SE slope through heavy young timber.</p> <p>35.53 The witness cor. to the $\frac{1}{4}$ sec. cor. of sec. 2 only,</p>	T 40 S	R 100 W	S 35	S 36
T 40 S	R 100 W				
S 35	S 36				

Dependent Resurvey, 10th Stan. Par. S.,
S. Bdy., T. 40 S., R. 100 W., Prin. Mer., Montana

CHAINS	T. 41 S., R. 100 W., hereinafter described in the field notes of the dependent resurvey of the subdivisional lines of T. 41 S., R. 100 W.
40.10	<p>The stan. $\frac{1}{4}$ sec. cor. of sec. 35, monumented with a basalt stone, 12 x 9 x 5 ins., loosely set 4 ins. in the ground, dimly mkd. $\frac{1}{4}$ on N face, from which the remains of an original bearing tree</p> <p>A stump hole, bears N. 20° E., 24 lks. dist., a down pine alongside, 20 ins. diam., with scribe marks S35 SC $\frac{1}{4}$ B visible on opened blaze.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, 2$\frac{1}{2}$ ins. diam., 10 ins. in the ground to solid rock, encircled by a mound of stone, 3 ft. base, to top of brass cap, mkd.</p> <p style="text-align: center;">SC T 40 S R 100 W <u>$\frac{1}{4}$ S 35</u> 1972</p> <p>from which</p> <p>A pine, 4 ins. diam., bears N. 30° E., 25 lks. dist., mkd. X BT.</p> <p>A hemlock, 4 ins. diam., bears N. 10° W., 18 lks. dist., mkd. X BT.</p> <p>Deposit the mkd. stone alongside the iron post in the mound of stone.</p> <p>NOTE.— The remainder of the field notes of the resurvey of the S. bdy. of T. 40 S., R. 100 W., and the W. bdy. of T. 41 S., R. 100 W., are omitted.</p> <p>Dependent Resurvey of the Subdivisional Lines of T. 41 S., R. 100 W., Principal Meridian, Montana</p> <p>(Restoring the survey executed by Paul D. Bryson in 1876)</p> <p>The cor. of secs. 1, 2, 35, and 36, on the S. bdy. of the Tp., is monumented with an iron post, 2$\frac{1}{2}$ ins. diam., firmly set, projecting 8 ins. above ground, with brass cap mkd. as described in the official record of the 1962 resurvey of the N. bdy. of T. 42 S., R. 100 W., from which the bearing trees mkd. in 1962</p> <p>A white oak, 16 ins. diam., bears N. 35° E., 89 lks. dist., mkd. T41S R100W S36 BT on unhealed blaze.</p> <p>A pine, 12 ins. diam., bears S. 20$\frac{1}{2}$° E., 75 lks. dist., mkd. T42S R100W S1 BT on unhealed blaze.</p> <p>A pine, 18 ins. diam., bears S. 67° W., 94 lks. dist., mkd. T42S R100W S2 BT on unhealed blaze. (Record bearing, S. 76° W.)</p> <p>A sawed pine stump, 24 ins. diam., bears N. 39° W., 25 lks. dist., with healed blaze.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, Subdivisional Lines,
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	<p>Add the marks 1972 on the brass cap.</p> <p>Cor. is located on N slope, N. 45° E., 10 lks. dist., from a cor. of fences extending S and W.</p> <p>N. $0^{\circ}30'$ W., bet. secs. 35 and 36, marking and blazing the true line.</p> <p>Desc. over N slope, through cleared area.</p>
5.56	<p>Point selected for witness cor. to the meander cor. of secs. 35 and 36, on right bank of the Bighorn River.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div data-bbox="725 574 894 721" data-label="Diagram"> </div> <p>from which</p> <p>A cottonwood, 13 ins. diam., bears S. $40\frac{1}{2}^{\circ}$ E., 27 lks. dist., mkd. X BT.</p> <p>A hemlock, 18 ins. diam., bears S. 29° W., 35 lks. dist., mkd. X BT.</p>
5.80	<p>Present right bank of river, course N. 70° E.</p>
6.10	<p>Point for the meander cor. of secs. 35 and 36, on right bank of river, at proportionate dist., falls in river; there is no remaining evidence of the original cor.</p>
11.40	<p>The meander cor. of secs. 35 and 36, on the eroding left bank of the river, monumented with a washed sandstone boulder, 20 x 15 x 10 ins., firmly set 12 ins. in the ground, mkd. with 1 groove on N and MC on S face, from which an original bearing tree</p> <p>A hemlock stump, 30 ins. diam., bears N. 29° E., 35 lks. dist., with healed blaze.</p> <p>True cor. point not remonumented due to danger of destruction by further erosion of river bank.</p>
	<p>N. $0^{\circ}58'$ W., beginning new measurement.</p> <p>Asc. S slope through dense undergrowth.</p>
0.50	<p>Point selected for witness cor. to the meander cor. of secs. 35 and 36, on left bank of Bighorn River.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div data-bbox="717 1544 887 1691" data-label="Diagram"> </div> <p>from which</p>

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	<p>A cottonwood, 12 ins. diam., bears N. $75\frac{1}{2}^{\circ}$ E., 55 lks. dist., mkd. X BT.</p> <p>A cottonwood, 16 ins. diam., bears N. 24° W., 110 lks. dist., mkd. X BT.</p> <p>Cor. is located at end of a fence extending N. $0^{\circ}58'$ W.</p> <p>Over level cleared land, along fence.</p>
0.80	Abandoned telephone line, bears E and W.
1.00	Road, unimproved, 15 lks. wide, bears E and W.
10.50	Wash, 20 lks. wide, 2 ft. deep, drains NE.
15.50	Enter scattering timber and undergrowth, edge bears E and W; asc. S slope.
27.10	Top of ascent, slopes E; desc. over N slope.
28.75	<p>Point for the $\frac{1}{4}$ sec. cor. of secs. 35 and 36, determined latitudinally by proportionate measurement and longitudinally by a fence line extending N and S.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 41 S R 100 W</p> <p>$\frac{1}{4}$</p> <p>S 35 S 36</p> <p>1972</p> </div> <p>from which</p> <p>A white oak, 18 ins. diam., bears S. $37\frac{1}{2}^{\circ}$ E., 27 lks. dist., mkd. $\frac{1}{4}$ S36 BT.</p> <p>A pine, 12 ins. diam., bears N. 87° W., 55 lks. dist., mkd. $\frac{1}{4}$ S35 BT.</p> <p>Cor. is located at S edge of cleared area, edge bears E and W.</p> <hr style="width: 20%; margin: 10px auto;"/> <p>N. $0^{\circ}21'$ W., beginning new measurement.</p> <p>Desc. over N slope across cleared area, along fence line extending N and S.</p>
11.05	Fence, barbed wire, bears E and W.
20.05	<p>Point for a witness point on line bet. secs. 35 and 36.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>WP</p> <p>T 41 S R 100 W</p> <p>S 35 S 36</p> <p>1972</p> </div> <p>Bury a basalt stone, 10 x 8 x 8 ins., mkd. X, at base of iron post.</p> <p>Point is located at cor. of fences extending N, S, and E.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
31.10	Creek, 10 lks. wide, course winding S. 25° E.; asc. across cleared area.
40.10	<p>Point for the cor. of secs. 25, 26, 35, and 36, falls at center line of asphalt-surfaced road, 25 lks. wide, bearing E and W, and in line with fence line to the S. The position was pointed out by local residents, is harmoniously related with other identified original cors. in the area, and is accepted as the best available evidence of the original cor. position.</p> <p>Drive a railroad spike flush with surface of the road, with top mkd. BLM 1972</p> <p>from which</p> <p>An iron post, 28 ins. long, 2½ ins. diam., set 24 ins. in the ground, for a reference monument, bears N. 45° E., 73 lks. dist., with brass cap mkd. THIS R100W S25 RM 1972 and an arrow pointing to the cor.</p> <p>An iron post, 28 ins. long, 2½ ins. diam., set 24 ins. in the ground, for a reference monument, bears S. 45° W., 85 lks. dist., with brass cap mkd. THIS R100W S35 RM 1972 and an arrow pointing to the cor.</p>
	<p>From the cor. of secs. 25, 30, 31, and 36, on the E. bdy. of the Tp., monumented with an iron post, 2½ ins. diam., firmly set, projecting 8 ins. above ground, with brass cap mkd. as described in the official record of the 1957 resurvey of the W. bdy. of T. 41 S., R. 99 W., from which the remaining bearing trees mkd. in 1957</p> <p>A pine, 10 ins. diam., bears S. 37½° E., 57 lks. dist., mkd. THIS R99W S31 BT on unhealed blaze. (Record, 67 lks.)</p> <p>A pine, 15 ins. diam., bears S. 87° W., 85 lks. dist., mkd. THIS R100W S36 BT on unhealed blaze.</p> <p>Add the marks 1972 on the brass cap.</p> <p>S. 89°48' W., bet. secs. 25 and 36.</p> <p>Over gently rolling, nearly level land.</p>
9.80	Enter scattering timber and undergrowth; desc. over W slope.
19.95	<p>Point for the E. 1/16 sec. cor. of secs. 25 and 36.</p> <p>Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">E 1/16 $\frac{S\ 25}{S\ 36}$</p> <p style="text-align: center;">1972</p> <p>from which</p> <p>A pine, 10 ins. diam., bears N. 20½° E., 75 lks. dist., mkd. E 1/16 S25 BT.</p> <p>A white oak, 17 ins. diam., bears S. 75° W., 116 lks. dist., mkd. E 1/16 S36 BT.</p>

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	Cor. is located on W slope, 20 lks. N of cor. of old fences extending S and E.
29.10	Fence, barbed wire, bears N and S; enter cleared area.
34.30	Cor. of barbed wire fences extending S and W; thence along fence line.
35.80	Asc. over E slope, across cultivated field.
39.90	Point for the $\frac{1}{4}$ sec. cor. of secs. 25 and 36, at intersection of barbed wire fences extending N, S, E, and W. This is the position of the $\frac{1}{4}$ sec. cor. according to local residents of the area, is harmoniously related to identified original cors., and is accepted as the best available evidence of the original cor. position. No permanent monument established.
	N. $89^{\circ}55'$ W., beginning new measurement.
	Asc. E slope, along barbed wire fence.
10.50	Cor. of barbed wire fences extending E and S; enter scattering timber and undergrowth.
12.88	Intersect line 1-2 M.S. No. 2332 Gold lode at a point from which cor. No. 2 bears S. $45^{\circ}03'$ E., 7.57 chs. dist., monumented with an aluminum post, 2 ins. diam., firmly set, projecting 2 ins. above ground, with aluminum cap mkd. G-2-2332.
25.77	Intersect line 3-4 M.S. No. 2332 Gold lode at a point from which cor. No. 4 bears N. $45^{\circ}03'$ W., 7.55 chs. dist., monumented with an aluminum post, 2 ins. diam., firmly set, projecting 3 ins. above ground, with aluminum cap mkd. G-4-2332.
30.10	Asphalt-surfaced road, 25 lks. wide, bears N and W.
40.05	The cor. of secs. 25, 26, 35, and 36.
	N. $0^{\circ}27'$ W., bet. secs. 25 and 26.
	Asc. across cleared area.
11.10	Enter scattering timber and undergrowth, edge bears E and W.
21.73	An original line tree, a pine, 24 ins. diam., in good condition, mkd. with two faint notches each on N and S sides. This now becomes an angle point from which <p>An iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears S. $20^{\circ}29'$ E., 47 lks. dist., with brass cap mkd. AP S25 RM 1972 and an arrow pointing to the cor.</p> <p>An iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears N. $47^{\circ}29'$ W., 85 lks. dist., with brass cap mkd. AP S26 RM 1972 and an arrow pointing to the cor.</p> <p>Line tree is on crest of a low ridge bearing E and W.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	N. 0°15' W., beginning new measurement.
	Desc. over steep N slope, through scattering timber and undergrowth.
18.37	Point for the $\frac{1}{4}$ sec. cor. of secs. 25 and 26, at proportionate dist., falls in gully, 15 lks. wide, draining E., where it is impracticable to establish a permanent monument; there is no remaining evidence of the original cor.
	Asc. over steep S slope, through dense undergrowth.
19.37	Point selected for the witness cor. to the $\frac{1}{4}$ sec. cor. of secs. 25 and 26.
	Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.
	<div style="text-align: center;"> WC $\frac{1}{4}$ T 41 S R 100 W S 26 S 25 ↓ 1972 </div>
	Raise a mound of stone, 3 ft. base, 2 ft. high, W of cor.
	From the witness cor. U.S.C. & G.S. triangulation station "SPRING 1951," bears N. 48°18' W., 2.57 chs. dist., a brass tablet, 3 ins. diam., seated in a concrete monument, 12 ins. sq., projecting 4 ins. above ground.
27.50	Top of ascent; thence over rolling land through scattering small timber.
58.13	Point for the cor. of secs. 23, 24, 25, and 26, at proportionate dist.; there is no remaining evidence of the original cor.
	Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.
	<div style="text-align: center;"> T 41 S R 100 W S 23 S 24 S 26 S 25 1972 </div>
	from which
	A cedar, 10 ins. diam., bears N. 75 $\frac{1}{2}$ ° E., 125 lks. dist., mkd. T41S R100W S24 BT.
	A white oak, 9 ins. diam., bears S. 35 $\frac{1}{2}$ ° E., 85 lks. dist., mkd. T41S R100W S25 BT.
	A white oak, 10 ins. diam., bears S. 27° W., 48 lks. dist., mkd. T41S R100W S26 BT.
	A red oak, 7 ins. diam., bears N. 10° W., 97 lks. dist., mkd. T41S R100W S23 BT.
	From this point the cor. of secs. 21, 22, 27, and 28, bears N. 89°51' W., 160.49 chs. dist., monumented with an iron post, $2\frac{1}{2}$ ins. diam., firmly set, projecting 6 ins. above ground, with brass cap mkd. as described in the official record of the 1965 remonumentation, from which the remaining bearing trees mkd. in 1965

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS									
	<p>A pine, 14 ins. diam., bears N. $55\frac{1}{4}^{\circ}$ E., 27 lks. dist., mkd. T41S R100W S22 BT on unhealed blaze. (Record, N. $45\frac{1}{4}^{\circ}$ E.)</p> <p>A pine, 18 ins. diam., bears N. 87° W., 75 lks. dist., mkd. T41S R100W S21 BT on unhealed blaze. (Record, 70 lks.)</p> <p>Add the marks 1972 on the brass cap.</p> <p>The control line was fully retraced, and no evidence of the intervening cors. was found.</p>								
	<p>NOTE.— The tie to and description of the cor. of secs. 21, 22, 27, and 28 is shown here to illustrate the proper form of the field notes when the control line is not resurveyed. When all subdivisional lines are resur- veyed, as in T. 41 S., R. 100 W., the description of lines and corners appears in regular order, and no refer- ence is made to the control corner at this point in the field notes.</p>								
	<p>From the cor. of secs. 19, 24, 25, and 30, on the E. bdy. of the Tp., monumented with an iron post, $2\frac{1}{2}$ ins. diam., firmly set, projecting 6 ins. above ground. The brass cap was erroneously mkd. as a cor. of minimum control for T. 41 S., R. 99 W., in the 1957 resurvey. Add mks. for T. 41 S., R. 100 W.; the cap is now mkd.</p> <div style="text-align: center;"> <table border="1"> <tr><td colspan="2">T 41 S</td></tr> <tr><td>R 100 W</td><td>R 99 W</td></tr> <tr><td>S 24</td><td>S 19</td></tr> <tr><td>S 25</td><td>S 30</td></tr> </table> <p>1972 1957</p> </div> <p>from which the only remaining bearing tree mkd. in 1957</p> <p>A pine, 24 ins. diam., bears N. $43\frac{1}{2}^{\circ}$ E., 57 lks. dist., mkd. T41S R99W S19 BT on partly healed blaze.</p> <p>and new bearing trees</p> <p>A pine, 10 ins. diam., bears S. $55\frac{1}{4}^{\circ}$ W., 85 lks. dist., mkd. T41S R100W S25 BT.</p> <p>A pine, 15 ins. diam., bears N. 87° W., 117 lks. dist., mkd. T41S R100W S24 BT.</p> <p>No suitable bearing tree is available within limits in sec. 30.</p> <p>Cor. is located at cor. of fences extending S and E.</p> <p>N. $89^{\circ}57'$ W., bet. secs. 24 and 25.</p> <p>Asc. over moderate E slope, across cleared area.</p> <p>7.50 Farm road, 15 lks. wide, bears N and S.</p> <p>10.35 Cor. of barbed wire fences extending S and W; thence along fence line.</p> <p>12.50 Crest of ridge, bears N and S; desc. over W slope.</p>	T 41 S		R 100 W	R 99 W	S 24	S 19	S 25	S 30
T 41 S									
R 100 W	R 99 W								
S 24	S 19								
S 25	S 30								

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
27.85	Cor. of barbed wire fences extending S and E; leave fence line.
35.10	Enter cultivated area, edge bears N and S.
39.95	Point for the $\frac{1}{4}$ sec. cor. of secs. 24 and 25, at proportionate dist.; there is no remaining evidence of the original cor. Point falls in cultivated area and was not remonumented, at the request of the owner.
44.95	Leave cultivated area, edge bears N and S; thence through heavy open timber.
57.30	Creek, 5 lks. wide, course N. 10° E.; asc. E slope through scattering timber and undergrowth.
79.90	The cor. of secs. 23, 24, 25, and 26.
NOTE.— The field notes of the dependent resurvey of the bulk of the subdivision lines in the township follow the same style as shown and are omitted.	
	N. $89^{\circ}47'$ W., bet. secs. 6 and 7. Over gently rolling land, through scattering timber and undergrowth.
10.25	Enter cleared area, edge bears N and S.
21.05	Fence, barbed wire, bears N and S.
40.05	Fence, barbed wire, bears N and S.
40.20	Point for the $\frac{1}{4}$ sec. cor. of secs. 6 and 7, at proportionate dist., falls in a gravel-surfaced road, 20 lks. wide, bearing N. 45° E. and S. 45° W.; there is no remaining evidence of the original cor. Set a sandstone, 12 x 10 x 9 ins., mkd. X, 6 ins. below surface of the road from which An iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears N. 45° W., 57 lks. dist., with brass cap mkd. THIS R100W S6 RM 1972 and an arrow pointing to the cor. An iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., set 24 ins. in the ground, for a reference monument, bears S. 45° E., 78 lks. dist., with brass cap mkd. THIS R100W S7 RM 1972 and an arrow pointing to the cor.
50.20	Enter scattering timber and undergrowth, edge bears generally N and S; desc. over W slope.
79.50	Intersect the E. bdy. of sec. 1, T. 41 S., R. 101 W. Point for the closing cor. of secs. 6 and 7. Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS

T 41 S	T 41 S
S 1	S 6
	S 7
R 101 W	R 100 W

1972

from which

A pine, 12 ins. diam., bears N. 35° E.,
15 lks. dist., mkd. T41S R100W S6 CC BT.

A pine, 10 ins. diam., bears S. 77½° E.,
27 lks. dist., mkd. T41S R100W S7 CC BT.

From this point the original closing cor. of secs. 6 and 7 bears N. 89°47' W., 0.10 chs. dist., monumented with a sandstone, 18 x 15 x 9 ins., firmly set 10 ins. in the ground, mkd. CC on the E, 1 groove on the N, and 5 grooves on the S face. Add the marks AM on E face and bury the stone in place, 6 ins. below surface.

From the same point the cor. of secs. 1 and 12, T. 41 S., R. 101 W., heretofore described, bears S. 0°03' E., 1.50 chs. dist.

The point for the ¼ sec. cor. of sec. 7 only, T. 41 S., R. 100 W., is at midpoint on the W. bdy. of sec. 7.

Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.

T 41 S
¼ S 7
R 100 W

1972

from which

A pine, 15 ins. diam., bears S. 78° E.,
79 lks. dist., mkd. ¼ S7 BT.

No other suitable bearing tree available within limits.

From this point the ¼ sec. cor. of sec. 12 only, T. 41 S., R. 101 W., bears S. 0°07' E., 1.35 chs. dist., heretofore described.

The point for the ¼ sec. cor. of sec. 6 only, T. 41 S., R. 100 W., is at proportionate dist. on the W. bdy. of sec. 6.

Set an iron post, 28 ins. long, 2½ ins. diam., 24 ins. in the ground, with brass cap mkd.

T 41 S
¼ S6
R 100 W

1972

from which

A pine, 12 ins. diam., bears N. 88° E.,
45 lks. dist., mkd. ¼ S6 BT.

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	<p>A white oak, 10 ins. diam., bears S. 78° E., 77 lks. dist., mkd. $\frac{1}{4}$ S6 BT.</p> <p>From this point the $\frac{1}{4}$ sec. cor. of sec. 1 only, T. 41 S., R. 101 W., bears S. $0^{\circ}07'$ E., 1.27 chs. dist., heretofore described.</p> <hr/> <p>From the cor. of secs. 5, 6, 7, and 8.</p> <p>N. $0^{\circ}10'$ W., bet. secs. 5 and 6.</p> <p>Over gently rolling land, through scattering timber and undergrowth.</p> <p>10.50 Fence, barbed wire, bears E and W; enter cleared area, edge bears same as fence.</p> <p>40.05 The $\frac{1}{4}$ sec. cor. of secs. 5 and 6, at intersection of barbed wire fences extending E, W, and N. This position is harmoniously related with identified existing original cors. in the area, has long been recognized by owners of the adjacent lands as the cor., and is accepted as the best available evidence of the original cor. position.</p> <p>At the corner point</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 41 S R 100 W</p> <p>$\frac{1}{4}$</p> <p>S 6 S 5</p> <p>1972</p> </div> <p>No cor. accessories established, at the request of adjoining landowners.</p> <hr/> <p>N. $0^{\circ}03'$ E., beginning new measurement.</p> <p>Over gently rolling land, across cleared area, along a barbed wire fence.</p> <p>19.90 Cor. of barbed wire fences extending E, W, and S; enter scattering timber and undergrowth.</p> <p>27.90 Desc. NE slope.</p> <p>38.57 Point for the closing cor. of secs. 5 and 6, on the N. bdy. of the Tp., at proportionate dist.; there is no remaining evidence of the original cor.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <div style="text-align: center;"> <p>T 40 S R 100 W</p> <p>S 31</p> <hr/> <p>S 6 S 5</p> <p>T 41 S R 100 W</p> <p>CC</p> <p>1972</p> </div> <p>from which</p>

APPENDIX

311

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	<p>A pine, 8 ins. diam., bears S. 35° E., 37 lks. dist., mkd. THIS R100W S5 CC BT.</p> <p>A pine, 12 ins. diam., bears S. 76° W., 48 lks. dist., mkd. THIS R100W S6 CC BT.</p> <p>Cor. is located at S edge of unimproved road, 15 lks. wide, bears E and W.</p> <p>From this point the stan. cor. of secs. 31 and 32, T. 40 S., R. 100 W., bears S. $89^{\circ}57'$ W., 4.85 chs. dist., heretofore described.</p>
	<p>The point for the $\frac{1}{4}$ sec. cor. of sec. 5 only, T. 41 S., R. 100 W., is at midpoint on the N. bdy. of sec. 5.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;"> $\frac{1}{4}$ S 5 T 41 S R 100 W 1972 </p> <p>from which</p> <p>A pine, 10 ins. diam., bears S. $37\frac{1}{2}^{\circ}$ E., 55 lks. dist., mkd. $\frac{1}{4}$ S5 BT.</p> <p>A pine, 12 ins. diam., bears S. 78° W., 105 lks. dist., mkd. $\frac{1}{4}$ S5 BT.</p> <p>Cor. is located at S edge of unimproved road, 15 lks. wide, bears E and W.</p> <p>From this point the stan. $\frac{1}{4}$ sec. cor. of sec. 32, T. 40 S., R. 100 W., bears S. $89^{\circ}57'$ W., 4.95 chs. dist., heretofore described.</p>
	<p>The point for the $\frac{1}{4}$ sec. cor. of sec. 6 only, T. 41 S., R. 100 W., is at proportionate dist. on the N. bdy. of sec. 6.</p> <p>Set an iron post, 28 ins. long, $2\frac{1}{2}$ ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;"> $\frac{1}{4}$ S 6 T 41 S R 100 W 1972 </p> <p>from which</p> <p>A pine, 14 ins. diam., bears S. 60° E., 20 lks. dist., mkd. $\frac{1}{4}$ S6 BT.</p> <p>A pine, 15 ins. diam., bears S. $37\frac{1}{2}^{\circ}$ W., 89 lks. dist., mkd. $\frac{1}{4}$ S6 BT.</p> <p>Cor. is located at SW side of curve in unimproved field road, 15 lks. wide, bears N and E.</p> <p>From this point the stan. $\frac{1}{4}$ sec. cor. of sec. 31, T. 40 S., R. 100 W., bears S. $89^{\circ}57'$ W., 4.70 chs. dist., heretofore described.</p>

MANUAL OF SURVEYING INSTRUCTIONS

Dependent Resurvey, Subdivisional Lines
T. 41 S., R. 100 W., Prin. Mer., Montana

CHAINS	
	<p>The point for the E. 1/16 sec. cor. of sec. 6 only, T. 41 S., R. 100 W., is at midpoint bet. the closing cor. of secs. 5 and 6 and the 1/4 sec. cor. of sec. 6 only, on the N. bdy. of sec. 6.</p> <p>Set an iron post, 28 ins. long, 2 1/2 ins. diam., 24 ins. in the ground, with brass cap mkd.</p> <p style="text-align: center;">E 1/16 S 6</p> <p style="text-align: center;">1972</p> <p>Raise a mound of stone, 3 ft. base, 2 ft. high, S of cor.</p> <p>Cor. is located at S edge of unimproved road, 15 lks. wide, bears E and W.</p> <p>From this point the stan. cor. of secs. 31 and 32, T. 40 S., R. 100 W., bears N. 89°57' E., 15.25 chs. dist., heretofore described.</p>
	<p style="text-align: center;">GENERAL DESCRIPTION</p> <p>The land encompassed in this survey is located about eight miles north of the town of Nugget. The northwest part of section 2, north part of section 3, and northeast part of section 4 are drained by Lucky Creek, a turbulent stream that rises in a small lake in the NW 1/4 of section 3. The remainder of the township is drained by the Bighorn River, its tributary, Flat Creek, and small tributaries of each, the drainage being generally to the east and southeast. Elevation ranges from about 3,450 feet above sea level where the Bighorn River enters section 36 to 5,275 feet above sea level on the divide between Lucky Creek and Flat Creek drainage.</p> <p>Access is by way of U.S. Highway No. 87, which crosses the center of the township in a north-south direction, an asphalt road that leaves the highway in section 33 and extends into section 25 to the recently closed Gold Lode Mine, an asphalt road extending into the north part of section 1 from the northeast, and numerous unimproved or lightly gravelled roads.</p> <p>There are scattering stands of timber, including pine, white and red oak, hemlock, cedar, and cottonwood, the predominate species being pine. The remainder of the township is naturally open or has been cleared. The undergrowth consists of young timber, sagebrush, and ceanothus (snow brush). There is a good cover of native grasses in uncultivated areas.</p> <p>The principal use of the area is livestock grazing. Public land areas are used for recreation by rockhounds, hunters, hikers, campers, and picnickers.</p> <p>The only improvements noted were buildings at the Gold Lode Mine in section 25, a few small cabins, fencing, and a small farm that extends into section 25 from the east.</p> <p>The only mineral noted was on the line between sections 25 and 36, near the Gold Lode Mine.</p> <p>The mean of a considerable number of observations of the magnetic declination throughout the township is 17°00' E., with a range of 1°10' in local attraction.</p>

SPECIMEN

FIELD NOTES

MINERAL SURVEY NO. 20220 A AND B

COLORADO

FIELD NOTES

OF THE SURVEY OF THE MINING CLAIM OF

THE GOLD MINING COMPANY

KNOWN AS THE JIM DANDY, PRINCE, AND

PROTECTOR LODES AND DUMP MILLSITE

Cottonwood Mining District, Chaffee County

Pueblo Land District

Sections 7, 8, 17, and 18, Township 16 South, Range 80 West, of the
Sixth Principal Meridian

Surveyed by H.B. SANDS, Mineral Surveyor, under order dated
April 9, 1972

Survey commenced May 10, 1972; completed May 14, 1972.

Address of claimant's agent,
John Jones, 561 Foster Building, Denver, Colorado

Dates of amended locations: Protector lode, June 16, 1971;
Prince lode, August 10, 1971.

Dates of locations: Jim Dandy lode, July 26, 1932;
Dump Millsite, August 10, 1971.

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A and B

	FEET	<p>This survey was made with a transit No. , with horizontal limb 5.65 ins. diam., having two double , opposite verniers, and full vertical circle 5 ins. diam., having one double vernier; the verniers read to one minute of arc; the eyepiece is equipped with a colored shade set in the dust shutter for making direct observations on the sun. The instrument was in good condition at the time of the survey, and all adjustments were in good order.</p> <p>All azimuths in this record were determined by the method of deflection angles referred to the meridian determined by the following observation:</p> <p>May 10, 1972, at Cor. No. 1 of the Jim Dandy lode, in latitude $38^{\circ}45'$ N., and longitude $106^{\circ}20'$ W., elevation 9,500 ft. above sea level, and temperature 50° F., make a series of six altitude observations on the sun for azimuth at approximately equal time intervals, three each with the telescope in direct and reversed positions, observing opposite limbs of the sun, and reading the horizontal angle from a reference point about 600 ft. southward SE. to the sun.</p> <p>Mean time of observation, 105th meridian standard time = 8^h15^m a.m. Declination of sun at mean time of observation = $17^{\circ}45'27.4''$ N. Mean observed vertical angle to sun's center = $37^{\circ}59'30''$ Mean horizontal angle from reference point to sun's center = $74^{\circ}10'$ S-E. True bearing to reference point = S. $8^{\circ}20'$ E.</p> <p>The lines were measured with a steel tape 300 ft. in length, graduated every foot for 100 ft., and the remainder at intervals of 10 ft.; and a steel tape 10 ft. in length, graduated to feet, tenths, and hundredths; both tapes were compared with a standard tape at the time of beginning the survey, and found to be correct.</p> <p>All lines and connections of this survey were run by direct methods where the lines are accessible; the inaccessible lines were run by traverse methods, as shown by the calculation sheets herewith submitted.</p> <p>The magnetic declination observed at each corner of the survey gave a uniform value of $15^{\circ}30'$ E.</p> <p>Mineral Survey No. 20220 A</p> <p>JIM DANDY LODGE</p> <p>At Cor. No. 1 of the Jim Dandy lode, identical with Cor. No. 1 of the Prince lode of this survey.</p> <p>Set a granite stone, 26 x 10 x 8 ins., 14 ins. in the ground to bedrock, surrounded by a mound of stone to top, mkd. JD-1-PRI-1-20220A; from which</p> <p>The cor. of secs. 7, 8, 17, and 18, T. 16 S., R. 80 W., 6th Prin. Mer., bears S. $55^{\circ}40'$ W., 212.5 ft. dist.; monumented with an iron post, 2 ins. diam., 12 ins. above ground, firmly set, with brass cap properly mkd., and with a mound of stone, 3 ft. base, 2 ft. high, W of cor.</p>
--	------	--

(This form bound at top)

APPENDIX

315

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A

FEET	
	<p>Cor. No. 1, M.S. No. 19557 Alley lode, bears N. 55°19' W., 360.0 ft. dist.</p> <p>Cor. No. 1, M.S. No. 19142 I.X.L. lode, claimant herein, bears S. 49°48' W., 642.7 ft. dist.</p> <p>Cor. No. 3, M.S. No. 18837 C.O.D. lode, bears N. 58°45' E., 208.47 ft. dist.</p> <p>A yellow pine, 14 ins. diam., bears N. 10°00' E., 38.3 ft. dist., mkd. JD-1-20220A BT.</p> <p>A distant peak, known as Barren Mt., bears N. 55°57' W.</p> <p>Thence N. 28°50' W.</p>
170.28	Intersect line 3-4, M.S. No. 19142 I.X.L. lode, at a point from which Cor. No. 3 bears N. 61°27' E., 871.43 ft. dist.
301.30	Lode line; discovery point bears N. 50°23' E., 496.0 ft. dist.
370.28	Intersect line 4-1, M.S. No. 19557 Alley lode, at a point from which Cor. No. 4 bears N. 44°30' E., 1,332.42 ft. dist.
456.67	Intersect line 4-1 Protector lode of this survey.
535.90	<p>Cor. No. 2, identical with Cor. No. 2 of the Prince lode of this survey.</p> <p>Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, and in a mound of stone, 3 ft. base, to top, with brass cap mkd. JD-2-PRI-2-20220A; from which</p> <p>A granite rock in place, 46 x 34 ins., 26 ins. above ground, bears S. 24°00' E., 10.5 ft. dist., mkd. X BO-JD-2-20220A.</p> <p>Thence N. 50°23' E.</p>
679.32	Intersect line 3-4 Protector lode of this survey.
1,150.19	Intersect line 4-1, M.S. No. 20062 Copper lode, at a point from which Cor. No. 4 bears S. 59°25' E., 94.5 ft. dist.
1,230.73	Intersect line 1-2, M.S. No. 12071 Major lode, at a point from which Cor. No. 2 bears S. 11°00' E., 101.3 ft. dist.
1,291.67	Intersect line 3-4, M.S. No. 19557 Alley lode, at a point from which Cor. No. 4 bears S. 45°30' E., 26.31 ft. dist.
1,500.00	<p>Cor. No. 3.</p> <p>On line 3-4, M.S. No. 20062 Copper lode.</p> <p>On granite bedrock outcrop, even with the general surface, point for Cor. No. 3, mkd. X JD-3-20220A; from which</p> <p>Cor. No. 4, M.S. No. 20062 Copper lode, bears S. 34°45' W., 330.0 ft. dist.; identical with Cor. No. 2, M.S. No. 12071 Major lode.</p> <p>A silver spruce, 16 ins. diam., bears N. 40°00' E., 47.5 ft. dist., mkd. JD-3-20220A BT.</p> <p>Thence S. 28°50' E.</p>

(This form bound at top)

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A

FEET	
234.60	Lode line; discovery point bears S. 50°23' W., 1,004.0 ft. dist.
241.90	Intersect line 2-3, M.S. No. 12071 Major lode, at a point from which Cor. No. 2 bears S. 79°00' W., 310.46 ft. dist.
404.50	Intersect line 1-2, M.S. No. 19910 Golden lode, claimant herein, at a point from which Cor. No. 1 bears S. 47°12' W., 620.0 ft. dist.
535.90	Cor. No. 4. This cor. falls on a rock slide where a permanent monument cannot be established; from this point Cor. No. 1, M.S. No. 19910 Golden lode, bears S. 59°26' W., 601.9 ft. dist. Thence S. 50°23' W.
99.66	A point on top of a granite boulder, 48 x 26 ins., 36 ins. above ground, for witness Cor. No. 4, mkd. X-WC-JD-4-20220A.
612.92	Intersect Cor. No. 3, M.S. No. 19142 I.X.L. lode, established on line 6-1, M.S. No. 19910 Golden lode, at a point from which Cor. No. 1 bears N. 28°33' W., 96.46 ft. dist.
1,500.00	Cor. No. 1, and place of beginning.
PRINCE LODE	
	Beginning at Cor. No. 1 of the Prince lode, identical with Cor. No. 1 of the Jim Dandy lode of this survey. Thence N. 28°50' W.
170.28	Intersect line 3-4, M.S. No. 19142 I.X.L. lode, at a point from which Cor. No. 4 bears S. 61°27' W., 628.57 ft. dist.
267.95	Lode line; discovery point bears S. 42°25' W., 849.0 ft. dist.
370.28	Intersect line 4-1, M.S. No. 19557 Alley lode, at a point from which Cor. No. 1 bears S. 44°30' W., 167.58 ft. dist.
456.67	Intersect line 4-1 Protector lode of this survey.
535.90	Cor. No. 2, identical with Cor. No. 2 of the Jim Dandy lode of this survey. Thence S. 41°58' W.
215.30	Intersect line 1-2, M.S. No. 19557 Alley lode, at a point from which Cor. No. 1 bears S. 45°30' E., 149.14 ft. dist.
356.	Center of road, 16 ft. wide, bears N. 15° W. and S. 15° E.
598.76	Intersect line 1-2, M.S. No. 4923 Idella lode, at a point from which Cor. No. 1 bears N. 24°48' E., 399.35 ft. dist.
756.32	Intersect line 4-1 Protector lode of this survey.
891.	Left bank of Chalk Creek, 18 ft. wide, course S. 42° E.
930.	Center of road, 16 ft. wide, bears N. 40° W. and S. 40° E.
1,504.00	Cor. No. 3.

(This form bound at top)

APPENDIX

317

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A

FEET	<p>Set a schist rock, 28 x 10 x 6 ins., 18 ins. in the ground, mkd. PRI-3-20220A; from which</p> <p>A silver spruce, 14 ins. diam., bears N. 10°00' E., 15.0 ft. dist., mkd. PRI-3-20220A BT.</p> <p>A yellow pine, 26 ins. diam., bears S. 45°00' E., 22.5 ft. dist., mkd. PRI-3-20220A BT.</p> <p>A cor. of the location bears N. 28°50' W., 12.5 ft. dist.</p> <p>Thence S. 28°50' E.</p>
255.45	Lode line; discovery point bears N. 42°25' E., 651.0 ft. dist.
331.80	Intersect line 1-2, M.S. No. 4923 Idella lode, at a point from which Cor. No. 1 bears N. 24°48' E., 1,461.0 ft. dist.
507.30	<p>Cor. No. 4.</p> <p>Set a brass tablet, 3¼ ins. diam., 3½-in. stem, in a concrete post, 24 ins. long, 6 ins. sq., 16 ins. in the ground, with top mkd. PRI-4-20220A; from which</p> <p>Cor. No. 2, M.S. No. 4923 Idella lode, bears N. 38°50' W., 157.72 ft. dist.</p> <p>A point on granite bedrock outcrop, even with the general surface, bears S. 26°00' E., 20.0 ft. dist., mkd. X BO-PRI-4-20220A.</p> <p>A cor. of the location bears S. 28°50' E., 16.1 ft. dist.</p> <p>Thence N. 43°00' E.</p>
220.00	Cor. No. 2 Dump Millsite of this survey.
480.	Creek, 2 ft. wide, course N.
665.	Center of road, 16 ft. wide, bears N. 55° W. and S. 55° E.
772.	Right bank of Chalk Creek, 16 ft. wide, course S. 47° E.
880.00	Cor. No. 1 Dump Millsite of this survey.
1,084.80	Intersect line 1-2, M.S. No. 19142 I.X.L. lode, at a point from which Cor. No. 1 bears S. 61°27' W., 240.5 ft. dist.
1,108.	Center of road, 16 ft. wide, bears N. 42° W. and S. 42° E.
1,237.60	Intersect the line bet. secs. 17 and 18 at a point from which cor. of secs. 7, 8, 17, and 18 bears North, 68.3 ft. dist., heretofore described. Enter patented land.
1,331.00	Intersect the line bet. secs. 8 and 17 at a point from which cor. of secs. 7, 8, 17, and 18 bears N. 89°59' W., 63.7 ft. dist. Leave patented land.
1,494.90	Cor. No. 1, and place of beginning.

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A

FEET	
	18 ins. above ground, mkd. X PRO-1-20220A; from which The cor. of secs. 7, 8, 17, and 18, bears N. 88°16' E., 640.1 ft. dist., heretofore described. Cor. No. 1 of the Jim Dandy and the Prince lodes of this survey, bears N. 80°19' E., 827.1 ft. dist. Thence N. 42°11' W.
245.44	Intersect line 3-4, M.S. No. 4923 Idella lode, at a point from which Cor. No. 4 bears N. 24°48' E., 518.26 ft. dist.
300.00	Lode line; discovery point bears N. 47°49' E., 73.0 ft. dist.
310.	Left bank of Chalk Creek, 20 ft. wide, course S. 2° E.
600.00	Cor. No. 2. Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, with brass cap mkd. PRO-2-20220A; from which Cor. No. 4, M.S. No. 4923 Idella lode, bears N. 65°29' E., 500.6 ft. dist. Cor. No. 2, M.S. No. 20100 Silver lode, claimant herein, bears N. 39°44' E., 381.6 ft. dist. A yellow pine, 12 ins. diam., bears N. 20°00' W., 35.0 ft. dist., mkd. PRO-2-20220A BT. A yellow pine, 14 ins. diam., bears S. 51°00' W., 22.0 ft. dist., mkd. PRO-2-20220A BT. Thence N. 47°49' E.
70.	Right bank of Chalk Creek, 19 ft. wide, course S. 30° E.
557.88	Intersect line 1-2, M.S. No. 20100 Silver lode, at a point from which Cor. No. 2 bears S. 64°25' W., 187.91 ft. dist.
625.	Center of road, 16 ft. wide, bears N. 22° W. and S. 22° E.
1,390.00	A point 5 ft. above the base of a granite cliff, 120 ft. high, facing S. 10° E., for witness Cor. No. 3, mkd. X WC-PRO-3-20220A.
1,500.00	Cor. No. 3. This cor. falls at an inaccessible point on the cliff, described above, where a monument cannot be established. Thence S. 42°11' E.
40.	Base of cliff, bears N. 82° E. and S. 80° W.
280.77	Intersect line 1-2, M.S. No. 20100 Silver lode, at a point from which Cor. No. 2 bears S. 64°25' W., 1,170.98 ft. dist.
300.00	Lode line; discovery point bears S. 47°49' W., 1,427.0 ft. dist.
342.02	Intersect line 2-3, M.S. No. 19557 Alley lode, at a point from which Cor. No. 2 bears S. 44°30' W., 903.05 ft. dist.
553.30	Intersect line 2-3 Jim Dandy lode of this survey.

(This form bound at top)

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A

FEET 600.00	<p>Cor. No. 4.</p> <p>Set a granite stone, 25 x 10 x 9 ins., 16 ins. in the ground, mkd. PRO-4-20220A; from which</p> <p>Cor. No. 4, M.S. No. 19557 Alley lode, bears N. 48°28' E., 613.35 ft. dist.</p> <p>No local bearing objects or bearing trees available.</p> <p>Thence S. 47°49' W.</p>
696.94	Intersect the common line 1-2 Jim Dandy and Prince lodes of this survey.
889.61	Intersect line 1-2, M.S. No. 19557 Alley lode, at a point from which Cor. No. 2 bears N. 45°30' W., 206.06 ft. dist.
1,054.	Center of road, 16 ft. wide, bears N. 15° W. and S. 15° E.
1,312.10	Intersect line 1-2, M.S. No. 4923 Idella lode, at a point from which Cor. No. 1 bears N. 24°48' E., 440.63 ft. dist.
1,431.05	Intersect line 2-3 Prince lode of this survey.
1,500.00	Cor. No. 1, and place of beginning.
Mineral Survey No. 20220 B	
DUMP MILLSITE	
At Cor. No. 1 of the Dump Millsite, on line 4-1 Prince lode of this survey.	
Set a brass tablet, 3¼ ins. diam., 3½-in. stem, in a concrete post, 24 ins. long, 6 ins. sq., 16 ins. in the ground, surrounded by a mound of stone, 3 ft. base, to top, mkd. DMS-1-20220B; from which	
The cor. of secs. 7, 8, 17, and 18, bears N. 36°28' E., 410.3 ft. dist., heretofore described.	
Thence S. 43°00' W.	
92.	Left bank of Chalk Creek, 16 ft. wide, course S. 47° E.
215.	Center of road, 16 ft. wide, bears N. 55° W. and S. 55° E.
400.	Creek, 2 ft. wide, course N.
660.00	Cor. No. 2, on line 4-1 Prince lode of this survey.
A yellow pine, 18 ins. diam., mkd. DMS-2-20220B; from which	
A yellow pine, 18 ins. diam., bears S. 80°00' E., 17.5 ft. dist., mkd. DMS-2-20220B BT.	
Thence S. 47°00' E.	
220.	Creek, 2 ft. wide, course N. 50° E.
330.00	Cor. No. 3.
Set a granite stone, 24 x 14 x 8 ins., 12 ins. in the ground to bedrock, surrounded by a mound of stone, 3 ft. base, to top, mkd. DMS-3-20220B.	

(This form bound at top)

MANUAL OF SURVEYING INSTRUCTIONS

Mineral Survey No. 20220 B

FEET	
	No local bearing objects or bearing trees available. Thence N. 43°00' E.
390.	Center of road, 16 ft. wide, bears N. 40° W. and S. 40° E.
425.	Right bank of Chalk Creek, 23 ft. wide, course S. 35° E.
660.00	Cor. No. 4. Set a granite stone, 26 x 10 x 8 ins., 14 ins. in the ground to bedrock, surrounded by a mound of stone to top, mkd. DMS-4-20220B; from which A yellow pine, 16 ins. diam., bears N. 15°00' E., 20.5 ft. dist., mkd. DMS-4-20220B BT. Thence N. 47°00' W.
330.00	Cor. No. 1, and place of beginning. The Dump Millsite contains 5.00 acres.

Mineral Survey No. 20220 A and B

AREAS	Acres
Total area, Jim Dandy lode -----	18.129
Area in conflict with -----	
Tract A, hereinafter described -----	0.450
M.S. No. 12071 Major lode -----	1.095
M.S. No. 19142 I. X. L. lode -----	1.708
M.S. No. 19557 Alley lode -----	2.815
M.S. No. 19557 Alley lode, exclusive of its conflict with M.S. No. 12071 Major lode -----	2.767
M.S. No. 19910 Golden lode -----	1.572
M.S. No. 19910 Golden lode, exclusive of its conflict with Tract A -----	1.122
M.S. No. 20062 Copper lode -----	0.357
M.S. No. 20062 Copper lode, exclusive of its conflict with:	
(1) M.S. No. 12071 Major lode -----	0.082
(2) M.S. No. 19557 Alley lode -----	0.246
(3) M.S. Nos. 12071 and 19557 Major and Alley lodes -----	0.030
Total area, Prince lode -----	17.008
Area in conflict with -----	
NW ¼ NW ¼ sec. 17 -----	0.050
M.S. No. 4923 Idella lode -----	3.258
M.S. No. 19142 I. X. L. lode -----	3.744
M.S. No. 19142 I. X. L. lode, exclusive of its conflict with NW ¼ NW ¼ sec. 17 -----	3.694
M.S. No. 19557 Alley lode -----	0.675
Total area, Protector lode -----	20.661
Area in conflict with -----	
M.S. No. 4923 Idella lode -----	3.826
M.S. No. 19557 Alley lode -----	4.776
M.S. No. 20100 Silver lode -----	3.036
Jim Dandy lode of this survey -----	0.981
Jim Dandy lode of this survey, exclusive of its conflict with M.S. No. 19557 Alley lode -----	0.000
Prince lode of this survey -----	0.650
Prince lode of this survey, exclusive of its conflict with:	
(1) M.S. No. 4923 Idella lode -----	0.628
(2) M.S. No. 19557 Alley lode -----	0.342
(3) M.S. No. 4923 and 19557 Idella and Alley lodes -----	0.320
Total area, Dump Millsite -----	5.000

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A and B

		<p style="text-align: center;">TRACT A</p> <p>That portion of M.S. No. 19910 Golden lode in conflict with Jim Dandy lode of this survey, excluded by said Golden lode in favor of a location now abandoned, is bounded and described as follows:</p> <p>Beginning at Cor. No. 4 Jim Dandy lode — Thence N. 28°50' W., 131.4 ft., to line 1-2 Golden lode; Thence S. 47°12' W., 275.6 ft., to a point on same line; Thence N. 79°00' E., 237.6 ft., to line 4-1 Jim Dandy lode; Thence N. 50°23' E., 42.0 ft., to place of beginning.</p> <p>Tract A contains 0.450 acres.</p> <p style="text-align: center;">LOCATION</p> <p>This survey is located in the SE $\frac{1}{4}$ sec. 7, SW $\frac{1}{4}$ sec. 8, NW $\frac{1}{4}$ sec. 17, and NE $\frac{1}{4}$ sec. 18, of T. 16 S., R. 80 W., Sixth Principal Meridian.</p> <p>The survey of the Jim Dandy and Protector lodes and the Dump Millsite is identical with the respective location or amended location as marked on the ground. The survey of the Prince lode is wholly within the amended location as marked on the ground; Cors. Nos. 1 and 2 are identical with corners of the location; Cors. Nos. 3 and 4 differ to the extent previously shown.</p> <p style="text-align: center;">EXPENDITURES</p> <p>The improvements and the value of the labor and improvements made upon or for the benefit of each of the lode locations embraced in said mining claim by the claimant or its grantors are as follows:</p>
No. 1		<p>The discovery cut of the Jim Dandy lode, the face of which being the discovery point, is on the lode line 496 ft. from a point on line 1-2, 301.3 ft. from Cor. No. 1; 6 ft. wide, 15 ft. face, runs N. 50°23' E., 30 ft. to face and portal of tunnel, 5 x 7 ft. in size, running N. 50° E., 23 ft. to breast; at breast is a winze, 5 x 5 ft., 20 ft. deep; tunnel and winze timbered.</p> <p>Value of cut, tunnel, and winze, \$380.</p>
No. 2		<p>A tunnel, 5 x 7 ft. in size, the portal of which bears N. 70°57' E., 373.5 ft. from Cor. No. 2 Jim Dandy lode, and runs N. 51°03' E., 148 ft., thence N. 31°45' E., 17.5 ft., thence N. 50°31' E., 49 ft. to breast; partly caved.</p> <p>Value, \$2,300.</p>
No. 3		<p>A trench, the west end of which bears N. 38°12' E., 395 ft. from Cor. No. 1 Jim Dandy lode; 4 ft. wide, 8 ft. deep, running N. 48° E., 40 ft.</p> <p>Value, \$125.</p>
No. 1		<p>The discovery cut of the Prince lode, the face of which being the discovery point, is on the lode line 84.9 ft., S. 42°25' W. from the center of line 1-2; 6 ft. wide, 13 ft. face; running N. 42°25' E., 20 ft. to face.</p> <p>Value, \$100.</p>
No. 2		<p>A shaft, the center of which bears N. 20°42' E., 450 ft. from Cor. No. 4 Prince lode; 4 x 7 ft., 3 ft. deep.</p> <p>Value, \$130.</p>
No. 1		<p>The discovery shaft of the Protector lode, the center of which being the discovery point, is on the center line 73 ft. from the center of line 1-2; 6 x 8 ft., 18 ft. deep, partly timbered.</p>

(This form bound at top)

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A and B

Value, \$200.

An interest in a common improvement described as follows:

A tunnel, 6 x 7 ft. in size, the portal of which bears S. 34°00' W., 668 ft. from Cor. No. 1 Prince lode; running N. 3°30' E., 230 ft. to Sta. 1; thence N. 23°30' E., 280 ft. to pt. A and 350 ft. to Sta. 2; thence N. 7°45' E., 19 ft. to pt. B, 100 ft. to pt. C, and 210 ft. to breast at date of survey. At pt. A, a drift, 5 x 7 ft. in size, runs N. 74°30' E., 55.6 ft. to breast. At pt. B, a drift, 5 x 7 ft. in size, runs N. 58° E., 70.8 ft. to breast and foot of raise, 5 x 5 ft., 16 ft. high. At pt. C is the beginning of a stope, 70 ft. long, 4 ft. wide, and averaging 30 ft. in height.

Value of tunnel, drifts, raise, and stope, \$14,200.

Value of one-eighth interest, \$1,775.

This improvement is in course of construction for the development of the three lodes of this survey and M.S. No. 19142 I. X. L. lode, M.S. No. 19910 Golden lode, M.S. No. 20100 Silver lode, and the Lead King and Daisy lodes, unsurveyed, which are all the contiguous lode claims owned in common within the range of benefit of said tunnel.

The surface rises rapidly to the north and east from the portal of the tunnel, and the extension in its present course, with necessary laterals, affords the most practical and economical means of developing each of the stated lodes at depth.

Five hundred dollars or over has been expended in this improvement in such a manner as tends to the development of each lode of this survey subsequent to its location and to the time since which common ownership and contiguity have prevailed; therefore an undivided one-eighth interest in its value is hereby credited to each of said lodes and a like interest apportioned to each of the other stated lodes of the common group.

The first 165 ft. of this tunnel, valued at \$2,400 was credited to M.S. No. 19142 I. X. L. lode.

An undivided one-half interest in the first 290 ft., valued at \$2,200, was credited to M.S. No. 19910 Golden lode.

An undivided one-fifth interest in the first 510 ft., valued at \$1,520, was credited to M.S. No. 20100 Silver lode.

Except as above stated, no portion of or interest in this improvement has been credited heretofore as patent expenditure to any lode claim.

OTHER IMPROVEMENTS

A cut, 6 ft. wide, the face of which bears S. 17°42' W., 402 ft. from Cor. No. 2 Prince lode, runs East, 20 ft., to 12 ft. face.

A shaft, 4 x 6 ft., 10 ft. deep, the center of which bears N. 37°17' E., 318 ft. from Cor. No. 1 Jim Dandy lode.

Claimant of each unknown.

A plank ore bin, 14 x 20 ft., 3 ft. deep, the north cor. of which bears S. 3°00' W., 210 ft. from Cor. No. 1 Dump Millsite; the long sides bear N. 20° W.

Claimant herein.

A frame compressor house and shop, the NE cor. of which bears S. 25°00' E., 80 ft. from Cor. No. 1 Dump Millsite; 16 x 30 ft. in size; the long sides bear N. 85° W.

Claimant herein.

Form 9180-22
(April 1965)
(formerly 4-693a)

Mineral Survey No. 20220 A and B

A frame bunkhouse, the NE cor. of which bears S. 50°00' W., 690 ft. from Cor. No. 1 Prince lode; 20 x 50 ft. in size; the long sides bear N. 86° W.
Claimant herein.

A bridge, the east end of which bears S. 3°00' W., 153 ft. from Cor. No. 1 Dump Millsite; of logs and planks, 10 ft. wide and 30 ft. long, bearing N. 50° E.
Claimant herein.

OTHER CORNER DESCRIPTIONS AND SUPPLEMENTAL DATA

M.S. No. 4923 Idella lode: Cors. Nos. 1, 3, and 4 are monumented with granite stones, firmly set and properly mkd.; Cor. No. 2 is lost. Line 3-4 was found to be approximately correct as approved; line 4-1 was found to be S. 65°05' E., 299.4 ft., instead of S. 65°12' E., 300 ft., as approved; line 1-2 shown as approved. From Cor. No. 1 the cor. of secs. 7, 8, 17, and 18, bears S. 31°56' E., 596.9 ft., instead of S. 33°47' E., 605.0 ft., as approved.

M.S. No. 12071 Major lode: Cor. No. 2 is monumented with a pine post, firmly set and properly mkd.; no other cors. could be found. All lines shown as approved. Owing to the absence of Cor. No. 1, the apparent error in the connecting line to the cor. of secs. 7, 8, 17, and 18, could not be verified.

M.S. No. 18837 C. O. D. lode: Cor. No. 3 is monumented with a granite stone, firmly set and properly mkd.

M.S. No. 19142 I. X. L. lode: Cors. Nos. 2, 3, and 4 are monumented with pine posts, firmly set and properly mkd.; Cor. No. 1 could not be found. Lines 2-3 and 3-4 are correct as approved; lines 1-2 and 4-1 are shown as approved.

M.S. No. 19557 Alley lode: Cor. No. 1 is monumented with a pine post and Cor. No. 4 with a granite stone, both firmly set and properly mkd.; Cors. Nos. 2 and 3 are lost. Line 4-1 was found to be S. 44°30' W., 1500.0 ft., instead of S. 44°20' W., 1,500.0 ft., as approved; lines 1-2 and 3-4 are shown at right angles to line 4-1, and each 300 ft. long as approved; this makes line 2-3, N. 44°30' E., instead of N. 44°20' E., as approved, and lines 1-2 and 4-3 each N. 45°30' W., instead of N. 45°40' W., as approved. From Cor. No. 4 of the Alley lode, Cor. No. 2, M.S. No. 12071 Major lode bears S. 21°10' W., 128.7 ft., instead of S. 20°35' W., 136.0 ft., as approved.

M.S. No. 19910 Golden lode: Cors. Nos. 1, 2, and 6 are monumented with granite stones, firmly set and properly mkd. Lines 1-2 and 6-1 are correct as approved.

M.S. No. 20062 Copper lode: Cors. Nos. 1, 2, and 3 are monumented with pine posts, firmly set and properly mkd. Cor. No. 4 is identical with Cor. No. 2, M.S. No. 12071 Major lode, described above. All lines are correct as approved.

M.S. No. 20100 Silver lode: Cors. Nos. 1 and 2 are monumented with granite stones, firmly set and properly mkd. Line 1-2 is correct as approved.

MEMORANDUM

Here explain any allowable disagreement with the location certificate, and show the cause.

FIELD ASSISTANTS

Name

Capacity

MANUAL OF SURVEYING INSTRUCTIONS

CERTIFICATE OF SURVEYOR

Name of Mineral Surveyor	Date
--------------------------	------

I HEREBY CERTIFY That in pursuance of an order received from the

dated _____, 19____, at _____,
 of _____,
 known as the (*lode, placer, or mill site*) _____,
 situated in _____, Township _____,
 Range _____ Meridian, in the State of _____.

This survey, designated as number _____, has been executed by me and under my direction and has been made in strict conformity with said order, the Manual of Instructions for the Survey of Public Lands of the United States, and in specific manner described in the foregoing field notes.

I FURTHER CERTIFY That the labor expended and improvements made upon and for the benefit of the (*lode or placer*) _____ location(s) embraced in the said mining claim by claimant(s) or grantors are fully stated in my report. The character, extent, location, and itemized value are specified in full detail. No portion of, or interest in, said labor and improvements so credited to this claim has been included in the estimate of expenditures upon any other claim.

(Location)	(Signature of Mineral Surveyor)
------------	---------------------------------

CERTIFICATE OF APPROVAL

Office
Location
Date

The foregoing field notes of mineral survey number _____, in _____, ☐ surveyed ☐ unsurveyed Township _____, Range _____, Meridian, in the State of _____, executed by _____, Mineral Surveyor, under order dated _____, 19____, having been critically examined and the necessary corrections made prior to their certification by the surveyor, the field notes and the survey therein described are hereby approved.

(Authorized Signature)	(Title)
------------------------	---------